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Case Report An unusual case of suicidal drowning: A case report

Anil Shandil¹, Shjv Ranian Kumar¹, Abhinav Abhay¹, Ravi Kumar¹, Sanleev Kumar¹, Oinam Gambhir Singh^{©2}*

¹Dept. of Forensic Medicine, Patna Medical College, Patna, Bihar, India
²Dept. of Forensic Medicine, All India Institute of Medical Sciences, Patna, Bihar, India



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Drowning Asphyxia Accidental	This is an Open Access (OA) journal, and articles are distributed under the terms of the Creative Commons Attribution-NonCommercial-ShareAlike 4.0 License, which allows others to remix, tweak, and build upon the work non-commercially, as long as appropriate credit is given and the new creations are licensed under
Suicidal	the identical terms.
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1. Introduction

Drowning is defined as a form of violent mechanical asphyxial death due to aspiration of water or any fluid into the lungs due to submersion of the body. Complete immersion of the body is not required and covering of the external respiratory orifices like the nose and mouth is sufficient to cause death of the person. It may be of different types like wet drowning where water enters into the lungs, dry drowning water enters up to the larynx causing laryngeal spasms, secondary drowning where death occurs later on due to drowning complications, and immersion syndrome where there is vagal inhibition due to very cold water.

It is a worldwide health problem. It is considered the second leading cause of death from unintentional injuries after road traffic injuries.¹ Approximately, 97% of drowning cases are reported from middle to low socio-economic countries.^{2,3}The South Asian Countries have a higher rate of death due to drowning as compared with the rest of the world.⁴

In majority of the cases, the manner of death is accidental. In India, suicidal drowning cases are also very common. Homicidal drowning cases are rare and it may occur in cases of infants and children.⁶

2. Case Report

An identified dead body of a Hindu male of about 72 years was brought for a medico-legal autopsy. He was found dead inside the attached toilet of a hotel room in a suspicious manner. The room was locked from inside but the toilet door was open. Police broke into the room and found his dead body in a suspicious way. Both his legs were tied with a cloth. One another cloth was also seen tied to the two plastic chairs which were kept one upon the other (Figure 1). The body was brought for autopsy covered with a white bed sheet. The worn clothes were dark brown colour pants and an off-white colour shirt, the sleeve was folded at the elbow

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* Corresponding author.

According to a report published by the Lancet in December 2019, there were about 62,000 drowning deaths in India in the year 2017. The incidence is higher the states like Madhya Pradesh, Chhattisgarh, and Assam.⁵

E-mail address: drgambhirsingh@gmail. com (O. Gambhir Singh).

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joint. The body was average in build and cold. Rigor mortis developed in the whole body and post-mortem lividity was more prominent over the front of the chest and face region and it was fixed. Natural orifices such as the nose, eyes, and mouth were closed and there was no oozing. There were features of asphyxial death such as subconjunctival hemorrhages in both eyes and deep cyanosis.



Figure 1: Position of the body



Figure 2: Ballooning of lungs

Internal examination showed the ballooning of the lungs with the presence of a moderate amount of froth (Figure 2). Few streaks of froth were seen in the trachea and bronchi. Cut sections of lung pieces showed oozing of frothy fluid. The heart was normal in appearance but moderate calcification and narrowing were seen in the first 1.5 cm of the left coronary artery. There was no intracranial hemorrhage and the brain matter was oedematous and congested.

3. Discussion

Deaths due to drowning are generally due to suicide or accidental in nature. Suicide by drowning is not uncommon in India. About 30,000 people drown in India annually and the number could be even bigger than this.⁷ It is a more common method of committing suicide, especially amongst women and more particularly in localities near sea, river or canal.⁸ In the present case the old man was found dead in a very unusual position, only his head being submerged in water of the bucket lying very close to the chairs. As the room was locked from the inside and as there was no sign of violence on his body including the clothes, it was most likely a case of suicide. Moreover, there was no disarrangement of articles in the toilet room. Considering all these circumstantial evidence, we concluded it as a case of drowning and the manner of death as a suicide.

4. Conclusion

Most of the drowning cases are accidental in nature. However, in certain cases, the manner of death can be suicidal or homicidal in nature. In complex situations, the establishment of manners may become very difficult. Sometimes, the use of uncommon methods of suicide may raise suspicion of foul play. In such cases, a proper investigation of the death scene and the deceased's history as well as a forensic autopsy is mandatory.

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6. Conflict of Interest

None.

References

- Veetil JN, Parambath VA, Rajanbabu B. An epidemiological study of drowning survivors among school children. J Family Med Prim Care. 2017;6(4):844–7.
- Van Beeck E, Branche CM, Szpilman D, Modell JH, Bierens JJ. A new definition of drowning: Towards documentation and prevention of a global public health problem. *Bull World Health Organ*. 2005;83(11):853–9.
- Peden MM, Mcgee K. The epidemiology of drowning worldwide. *Inj* Control Saf Promot. 2003;10(4):195–204.
- Szpilman D, Bierens JJ, Handley AJ, Orlowski JP, Drowning. N Engl J Med. 2012;366:2102–2112.
- Bhattacharya DN. 83 Deaths Every Day in 2018 Due to Drowning in India; 2020. Available from: https://www.newsclick. in/83-deaths-very-day-2018-due-drowning-india-report#:~: text=prevent%20drowning%20accidents.-.
- Kumar A, Shivaramu MG, Kumar U. Pattern of Drowning Cases in Rural Area: A Retrospective Autopsy Study. J Med Sci Health. 2015;1(3):18–20.

- Drowning Prevention Rashtriya Life Saving Society. Available from: https://www.lifesavingindia.org/drowning-prevention/#:~: text=As%20per%20the%20Government%20of,is%20common% 20in%20our%20villages..
- Reddy KSN, Murty OP. The Essentials of Forensic Medicine & Toxicology. and others, editor. New Delhi: Jaypee Brothers; 2022. p. 284–92.

Author biography

Anil Shandil, Professor

Shjv Ranian Kumar, PG Student

Abhinav Abhay, PG Student

Ravi Kumar, PG Student

Sanleev Kumar, PG Student

Oinam Gambhir Singh, Professor in https://orcid.org/0000-0002-3955-3185

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