

Mind the Neck: Particular Patterns of Suicide in the Cervical Region

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Abstract

There is an impressive diversity on suicidal methods, and reports of rare cases are numerous. The authors present here two cases with self-inflicted lethal wound to the neck. The cervical region and its structures are highly susceptible to life-threatening injuries, and hanging is a notorious method of suicide.

However, the cases presented here are unusual due to some factors. The first one used an elastic thread that served as a tourniquet when wrapped around the neck. The second one self-inflicted a deep wound cutting through the right carotid artery, jugular vein and paratracheal structures, with several hesitating marks being visible as well.

Keywords: Suicide; Neck injuries; Self-cut wounds; Hesitating marks.

INTRODUCTION

The neck and its structures are of predilection when it comes to lethal wounds, self-inflicted or not. Hanging, cut through injuries to the neck and self-strangulation are suicidal methods of high brutality, prevalent among male victims, albeit large statistics are missing.¹

Literature is particularly rich with unusual and atypical cases, since victims use different methods of suicide that have all slight differences in

between.^{2,3} It is as well terminological and maybe methodological issue to define 'atypical' cases and to separate these from 'typical' ones.⁴

Not less discussable and debatable remain the psychiatric grounds and covert psychopathology anticipating the suicidal act. The majority of sources will obviously impute depression, substance abuse and other stressful life events as etiological factors.⁵ It might be, however, difficult to document previous psychiatric conditions when there have been no warning signs or other auto-mutilating behaviors. Forensic experts should as well deter themselves from the general opinion, which is common to many physicians, that suicide and depression have a straightforward connection. In fact, multiple factors will determine the performance of the suicidal act, its lethality, and even the chosen method from the victim.

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CASE REPORTS

Both cases described below are males of adult

age (first case: 41 years old; second case: 53 years old).

The first case was found dead lying in supine position in his bedroom, after the relatives broke the main door entrance of the house. He did not reply to phone calls, and left no message to the

family. Attempts to resuscitate him were useless, and he had an elastic band wrapped around the neck. The elastic thread was cut immediately into pieces, but when paramedics arrived at the scene, they could only witness the death and call the coroner (Fig. 1A and 1B).



Fig. 1A: (Left Inset): Elastic band wrapped several times around the neck.

Fig. 1B: (Right Inset): the pieces of elastic band as collected in the crime scene.

The *second case*, a 53-year old male was found in the bathroom while bleeding deeply from the neck. The wife sent him with the help of neighbors to the local hospital where he was declared dead upon arrival.

There was a history of ethanol abuse, but as in all other cases, relatives tend to downplay the

importance of abuse and addiction.

The autopsy documented a deep, lacerating wound starting from the right supraclavicular area and going deep in the median cervical structures. Several hesitating marks were visible below and above the central, lethal wound (Fig. 2).



Fig. 2A: (Left Inset): Deep lacerating wound in the anterior neck region, with several superficial, hesitating marks.

Fig. 2B: (Right Inset): The kitchen knife used for inflicting of the wounds.

DISCUSSION

The common streak connecting these cases were the unexpected event, the fact that both were males of adult ages, neck injuries, and almost an irrelevant psychiatric history. Toxicology yielded no proof of any drug of abuse in both cases.

Cases of suicidal neck injuries are well proven and numerous, but mostly in the hanging cases. Reports of self strangulation and self-cut wounds to the neck are available as well. A diversity of tools are describes to use self-cut wounds, here including utility knives, power drills and sawing tools.⁶ Neck and throat injuries as self-mutilating and suicidal events are not rare, but generally limit their appearance into superficial wounds and hesitating marks or cuts.⁷ There are, however, cases when no hesitating marks or tentative cuts existed.⁸ The lack of these hesitating marks will obviously raise the doubts always existing of differentiating between a homicide and a suicide.

Deep, profound self-inflicted wounds to the neck will leave little space for probable survival. In our case, the victim cut the left carotid artery and jugular vein and the injury reached tracheal structures. Obviously, exsanguination and hemorrhagic shock caused the death, with no time left for any surgery or resuscitation measures.

The first case, that used an elastic thread or band wrapped tight several times around the neck, is unusual, since we rarely encounter this type of material for suicidal purposes. Victims generally use cables, strings or wires whose consistency is tight and inflexible.⁹ Of pathogenetic importance might be the fact that elastic bands have the effect of a tourniquet, with an enhanced blocking role on the circulatory system. Venous compression will cause congestion and facial hyperemia, which were very much visible in our case.¹⁰

Some authors suggest that strangulations through a tourniquet like mechanism are mostly homicidal; while ligature strangulations are common as a suicidal tool, even in specific settings such as in custody.^{11,12}

Clearly, it is of high importance a thorough and well documented examination of the crime scene, as well as the recollection of all data regarding any previous psychiatric condition of the victim.

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