

Case Report

Penile Urethral Section by Firearm in an Adolescent: A Case Report at Somine Dolo Hospital, Mopti (Mali)

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Abstract: Since 2012, Mali has been experiencing a security crisis, characterized by armed attacks against civilians and soldiers; in the form of terrorist attacks or ambushes using various vulnerable agents. The injuries observed are often multiple and serious and can affect all organs to varying degrees. The penis is rarely hit by firearms due to its position, its volume relative to the rest of the body, and its mobility. We report a case of penile urethral section by firearm, initially treated in a primary structure, then referred to our structure for better management. The patient was a 13-year-old boy with no known medical or surgical history. He was traveling to their field with his older brother in a cart. Along the way, they were attacked by unidentified armed individuals. They were immediately rescued and taken back to their health facility, where the older brother succumbed to his injuries. There, he underwent an open cystostomy and a penile bandage, as he had no other associated injuries. A week later, he was referred to our facility for better care. On admission, he was hemodynamically stable and had a well-draining cystostomy catheter. Lateroventral penile degeneration was present, along with a section of the penile urethra over an infected wound. There were no lesions of the corpora cavernosa. Otherwise, there were no other unusual features. We initially initiated treatment with antibiotics, anti-inflammatories, and a daily dressing. He also received antitetanus serum. Three months later, we scheduled and performed an end-to-end urethroplasty of the penile urethra under a CH14 catheter. The postoperative course was uneventful.

Keywords: Penile urethra, firearm, urethroplasty, cystostomy, Mopti, Mali.

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INTRODUCTION

Firearm injuries are defined as any injury produced on the human body by proximity or shock of a firearm [1]. Since 2012, Mali has been going through a security crisis, characterized by armed attacks against civilians and soldiers; in the form of terrorist attacks or ambushes with the use of different injurious agents.

The lesions observed are often multiple and serious and can affect all organs to varying degrees. Urogenital gunshot wounds are relatively uncommon; according to several studies, they constitute 6 to 11% of all firearm injuries [2, 3]. The penis is rarely hit by firearms because of its position, its size relative to the rest of the body, and its mobility.

We report a case of penile urethral section by firearm, initially treated in a primary structure, then referred to our structure for better management.

OBSERVATION

The patient was a 13-year-old boy with no known medical or surgical history. He was traveling to their field with his older brother in a cart. Along the way, they were attacked by unidentified armed individuals. They were immediately rescued and taken back to their health facility, where the older brother succumbed to his injuries. There, he underwent an open cystostomy and a penile bandage, as he had no other associated injuries. A week later, he was referred to our facility for better care.

On admission, he was in good general condition and had a stable hemodynamic state, and had a well-draining cystostomy catheter. Lateroventral

penile degeneration associated with a section of the penile urethra on an infected wound (Figure 1, 2). There was no corpus cavernosum lesion.



Figure 1



Figure 2

Otherwise, there were no other particularities. We initially started a treatment based on antibiotics, anti-inflammatories and a daily dressing. He also received antitetanus serum. Three months later, we

scheduled and performed an end-to-end urethroplasty under a ch14 silicone catheter (Figure 3 & 4). The postoperative course was simple.

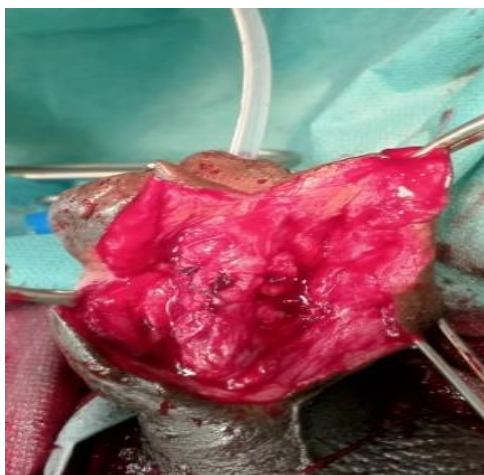


Figure 3: Urethroplasty



Figure 4

DISCUSSION

External genital organ injuries are rare and are due to their anatomical location in the perineum. This area constitutes a small and hidden surface and does not constitute a ballistic target. These injuries represent 1 to 2% of all war wounds and 29 to 56% of all urogenital wounds. Ballistic trauma to the penis is rare in both civilian and military settings [1]. In Burkina Faso, Clôtaire Alexis [4] and Kaptcha [5] in Togo each found one case of a gunshot wound in a civilian setting. Tomislav LUKACEVIC in Croatia found 4 cases of penile gunshot trauma out of 32 genital injuries, or 1.25% of cases in a series of 115 war injuries. [6], while in Senegal BAH *et al.*, [1] reported 6 cases in 4 years.

Trauma to the external genital organs is rarely isolated, it is frequently associated with muscular and/or visceral injuries [7]. However, in our observation the lesion concerned was the penile urethra which was severed by the projectile in its passage.

CONCLUSION

Ballistic penile injuries are rare. However, a thorough physical examination can help establish a proper diagnosis and then take appropriate action. Management should be provided by a specialist.

Conflicts of Interest: The authors declare no conflicts of interest regarding the publication of this paper.

REFERENCES

1. I Bah, AB Diallo, B Diao, et al., Traumatic injuries of the external genitalia. A report of six observations at A Le Dantec Hospital, Dakar, Senegal. *African journal of urology*; 2006 (12), 1: 55-59.
2. Diabaté I, Ondo CZ, Ouédraogo B, et al., Amputations and other penile trauma. *Afr J Urol*. Dec 2017;23(4):300-5.
3. Prunet D, BOUCHOT O.: Penile trauma. *Prog. Urol.*, 1996, 6: 987-993.
4. Clôtaire AMKDY, Brahim Kirakoya, Moussa Kaboré et al., Trauma of External Genitalia by Firearm: Therapeutic Strategy and Result, about a Case at CHU-YO, Ouagadougou, Burkina Faso. *Open Journal of Urology*, 2016, 6, 63-66.
5. Kpatcha TM, Tengue K, Tchangai et al., AN EXTERNAL GENITALIA INJURIES BY FIREARM: ABOUT ONE CASE 2014, (1):2; 129-132.
6. LUKACEVIC T, TUCAK A, KUVEZDIC H. War injuries of the external genitalia. *Progress in Urology* (1997), 7, 259-261.
7. GHILAN AM, GHAFOR MA, AL-ASBAHI WA, AL-KHANBASHI OM, ALWAN MA, AL-BADANI TH. Gunshot wound injuries to the male external genitalia. *Saudi Med J*. 2010; 31(9):1005-10.

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