

Migrated Sewing in Urethra in a Young Male, Tricky Situation Sorted with Cystoscope

Dr. Preet Thakur¹, Dr. Manjeet Kumar^{2*}

¹Department of Surgery, Indira Gandhi Medical College, Shimla-171001, India

²Assistant Professor, Department of Urology, IGMC, Shimla HP, India

DOI: [10.36347/sjmcr.2022.v10i07.007](https://doi.org/10.36347/sjmcr.2022.v10i07.007)

| Received: 02.06.2022 | Accepted: 06.07.2022 | Published: 13.07.2022

*Corresponding author: Manjeet Kumar

Assistant Professor, Department of Urology, IGMC, Shimla HP, India

Abstract

Case Report

The self-insertion of sewing needles into the urethra is an unusual emergency faced by a urologist. The most common cause for self-insertion of urethral foreign bodies is unknown however autoerotism/psychological impairment has been implicated. Because of guilt and embarrassment, patients usually do not take medical advice unless he is symptomatic. A 24-year male inserted a sewing needle through the urethra for autoerotic stimulation which has impacted at proximal bulbar urethra and piercing the post wall of the urethra towards the rectum. The needle was successfully removed by cystoscope assistance with difficulty after grasping with forceps. Follow-up after cystourethroscopy is important for diagnosing urethral stricture. The main objective of this case reports that foreign bodies inserted especially in the urethra can migrate. Milking of a needle is contraindicated as it may pierce the urethra and migrate to adjacent structures. Removal of these needles under cystoscopy guidance is mandatory.

Keywords: cystourethroscopy, genitourinary (GU), Migrated Sewing in Urethra, foreign bodies.

Copyright © 2022 The Author(s): This is an open-access article distributed under the terms of the Creative Commons Attribution **4.0 International License (CC BY-NC 4.0)** which permits unrestricted use, distribution, and reproduction in any medium for non-commercial use provided the original author and source are credited.

BACKGROUND

The patient with a foreign body in the genitourinary (GU) tract is perhaps one of the rare emergencies encountered. Based on the size, location, the shape of the foreign body, various techniques and methods can be adopted for its removal [1, 2]. Urethral foreign bodies are rare with most cases reported being self-inflicted and some due to iatrogenic injuries or migration from adjacent sites. The most prevalent motivation for self-insertion of urethral foreign bodies is autoerotism/psychological impairment/ or curiosity. Patients are often symptomatic at presentation and give a history of the foreign body in the urethra [2, 3].

CASE PRESENTATION

A 24-year male presented with urethral bleeding and pain for 2 days. He gave a history of

inserting sewing needles through the urethra for autoerotic stimulation which has impacted at proximal bulbar urethra and piercing the posterior wall of the urethra towards the rectum. There was no history of psychiatric disorders, trauma, drug abuse. The external genitalia was normal, and the needle was not palpable. Plain X-ray pelvis revealed a linear radio-opaque foreign body-like needle lying below pubic symphysis (Figure 1a). Cystourethroscopy showed the tip of a sharp sewing needle in the bulbar urethra (Figure 1b). Other radiographic images were also taken to study of the presence of foreign body (Figure 1c and d). Difficulty in grasping and removal of the needle was encountered as it was deep stuck posteriorly outside the urethra. The sewing needle was successfully removed by cystoscope assistance with difficulty after grasping with forceps (Figure 2a & b; Video 1).

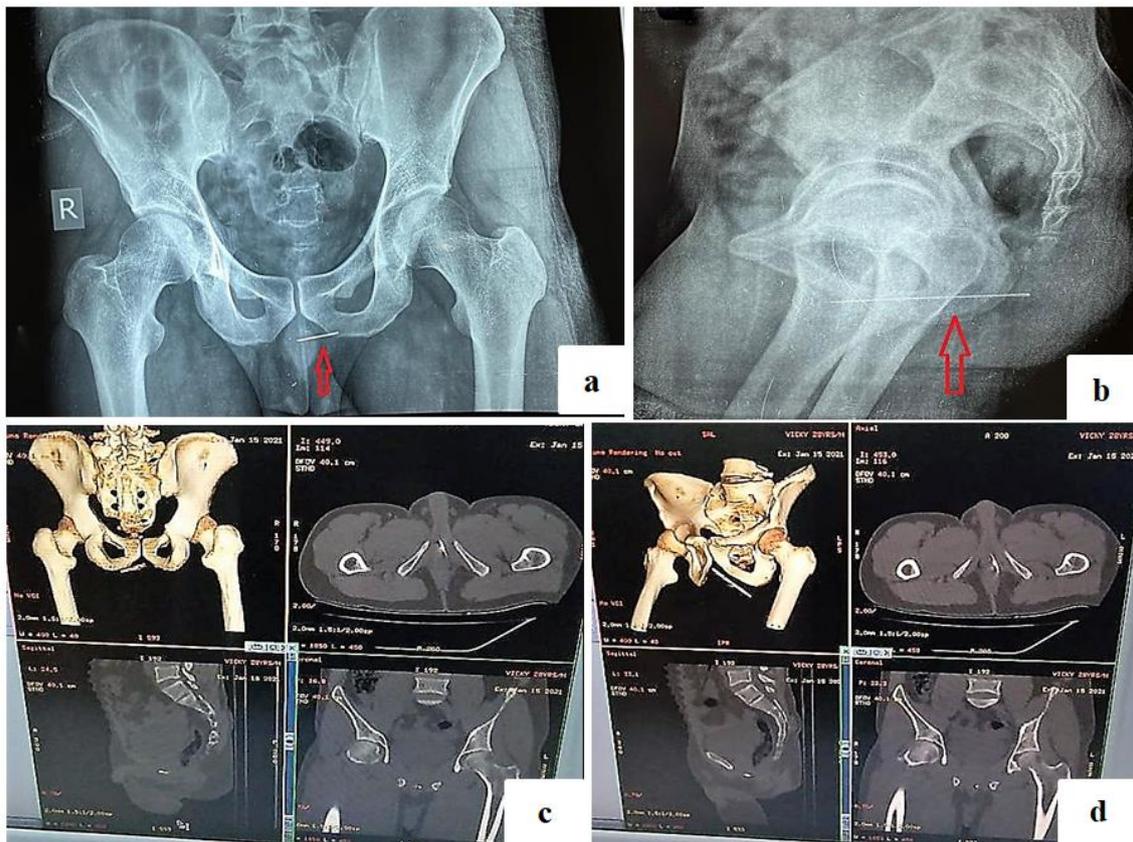


Fig 1: Plain pelvic radiography (Anteroposterior (a) and lateral (b)) showing a radio-opaque foreign body (arrow) below the pubis. Other radiographic images anterior or ventral view (c) and lateral view (d)

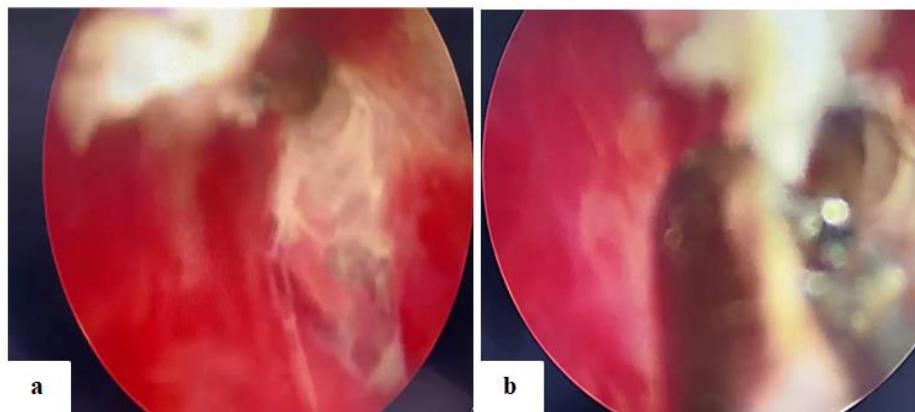


Fig 2: Cystourethroscopy showing a sharp sewing needle at the penile urethra along its axis (a). Extracting the needle using foreign body removal forceps (b)



Fig 3: Removed Sewing needle



video 1.mp4

Video 1: Cystourethroscopy assisted removal of sewing needle

INVESTIGATIONS

The physical examination followed plain X-ray examination revealed the presence of sewing needle impacted at the proximal bulbar urethra.

DIFFERENTIAL DIAGNOSIS

Plain X-ray examination revealed the presence of sewing needle impacted at proximal bulbar urethra posteriorly, piercing post wall of urethra towards the rectum.

TREATMENT

Cystourethroscope assisted removal of the needle was performed followed by supportive care.

OUTCOME AND FOLLOW-UP

The sewing needle was successfully removed by cystoscope assistance and on follow-up, he is doing well.

DISCUSSION

Diverse foreign bodies inside the urethra have been reported in the literature; sewing needles, pens, electrical wire, stapler clips, magnetic steel balls, wooden sticks, Blu Tack adhesive, razor blades, batteries, candles, toothbrushes rubber, screws, bullets, wires, surgical instruments up to dead animals like snakes and fish. Urethral insertion of foreign bodies is done for a variety of reasons and the attending urologist should be cognizant of these. Whilst more common reasons are sexual gratification, illicit drug transport, dementia, and contraception efforts, the insertion may also have taken place in the setting of assault or sexual abuse, trauma, foreign bodies migration and may represent a patient safeguarding issue. Some patients report the insertion of foreign bodies as an act of self-punishment [4, 5].

The psychoanalytical theory describes the practice of the use of objects for sexual gratification, the most common cause of retained foreign bodies. The accidental discovery of pleasurable stimulation of the urethra, by inserting foreign bodies is initiating event. Further repetition of this action using objects is driven by a particular psychological predisposition to sexual gratification. Other underlying causes of self-insertion may be psychiatric illness and polyembolokoilamania (a

broad group of disorders characterized by self-insertion of objects into body orifices) [5, 6].

The patient presented with a foreign body (FB) in their urethra is usually rare and delayed owing to the emotion of shame, guilt, and embarrassment. Most of the patients usually do not take medical advice unless a complication arises. Therefore, a foreign body in the urethra may remain undiagnosed unless patients reveal a clue. Most patients present with hematuria, dysuria, urinary frequency, strangury, and urinary retention [3, 6-9].

The best answer for the management question should represent the characters of minimal invasiveness, having fewer long-term complications, and ensuring early recovery. Since early reports in the literature, cases with urethral foreign bodies have been extremely variable and interestingly challenging. Management by endoscopic surgery is usually a preferred option for small foreign bodies. Open surgery is reserved for large objects with difficult access [4]. Appropriate surgical technique guided by physical examination/ imaging with endoscopic removal is often successful, depending on the object's physical attributes and morphology while minimizing urothelial trauma and preserving voiding and erectile function. Follow-up cystourethroscopy is important for diagnosing any complications and urothelial injuries [3].

Consequences such as fulminant sepsis and death may ensue with such behavior in the event of delayed medical intervention. Despite available literature on self-inserted urethral foreign bodies, this case warrants attention given the challenge faced in removing multiple impacted sharp foreign bodies like needles and screws from the penile and bulbar urethra without any significant obstructive symptoms [10]. Severe complications such as fulminant sepsis, perforation, or even death can stem from a late presentation.

Wang *et al.*, 2021 [2] reported a 14-year-old boy with urethral self-insertion of a sewing needle that was lodged in the urethra for 9 years. The needle was successfully removed by a urethrocystoscope with a surgical grasper. Singh *et al.*, 2014 [3] reported Multiple Impacted Urethral Metallic Needles and Screws (Foreign Bodies) Associated with Polyembolokoilamania. Albakr *et al.*, 2021[4] reported a case of self-insertion of a large urethral foreign body with a caliber of 45F in a young gentleman. Endoscopic extraction of the foreign body was safely successful using combined percutaneous and transurethral cystoscopy. Zaghbib *et al.*, 2019 [7] reported urethral self-insertion of a sewing needle in a 14-year-old boy is very rare. Vahidi *et al.* 2021 [11] reported a 10y/o boy, 3 hours after self-insertion of a large sewing needle in his urethra was admitted to the urology department. He had no history of mental and psychiatric disorders.

Vahidi *et al.*, 2021 [11] removed a big sewing needle from the urethra through the skin without any complication for the first time.

The main objective of this case report is to diagnose these foreign bodies early and exigent removal is prudent to prevent migration and prevent urosepsis. Cystoscopy removal is successful if early intervention is done.

Diverse foreign bodies inside urethra have been reported in the literature; sewing needles, pens, electrical wire, stapler clips, magnetic steel balls, wooden sticks, Blu Tack adhesive, razorblades, batteries, candles, toothbrushes rubber, screws, bullets, wires, surgical instruments up to dead animals like snakes and fish. Urethral insertion of foreign bodies is done for a variety of reasons and the attending urologist should be cognizant of these. Whilst more common reasons are sexual gratification, illicit drug transport, dementia and contraception efforts, the insertion may also have taken place in the setting of assault or sexual abuse, trauma, foreign bodies migration and may represent a patient safeguarding issue. Some patients report insertion of foreign bodies as an act of self-punishment [4, 5].

Psychoanalytical theory describes the practice of use of objects for sexual gratification, the most common cause of retained foreign bodies. Accidental discovery of pleasurable stimulation of the urethra, by inserting foreign bodies is initiating event. Further repetition of this action using objects is driven by a particular psychological predisposition to sexual gratification. Other underlying causes of self-insertion may be psychiatric illness and polyembolokoilamania (broad group of disorders characterized by self-insertion of objects into body orifices) [5, 6].

The patient presentation with a foreign body (FB) in their urethra is usually rare and delayed owing to the emotion of shame, guilt and embarrassment. Most of the patients usually do not take medical advice unless a complication arises. Therefore, a foreign body in the urethra may remain undiagnosed unless patients reveal a clue. Most patient present with hematuria, dysuria, urinary frequency, strangury, and urinary retention [3, 6-9].

The best answer for the management question should represent the characters of minimal invasiveness, having fewer long-term complications, and ensuring early recovery. Since early reports in the literature, cases with urethral foreign bodies have been extremely variable and interestingly challenging. Management by endoscopic surgery is usually a preferred option for small foreign bodies. Open surgery is reserved for large objects with difficult access [4]. Appropriate surgical technique guided by physical examination/ imaging with endoscopic removal is often

successful, depending on the object's physical attributes and morphology while minimizing urothelial trauma and preserving voiding and erectile function. Follow-up cystourethroscopy is important for diagnosing any complications and urothelial injuries [3].

Consequences such as fulminant sepsis and death may ensue with such behavior in the event of delayed medical intervention. Despite available literature on self-inserted urethral foreign bodies, this case warrants attention given the challenge faced in removing multiple impacted sharp foreign bodies like needles and screws from the penile and bulbar urethra without any significant obstructive symptoms [10]. Severe complications such as fulminant sepsis, perforation or even death can stem from late presentation.

Wang *et al.*, 2021 [2] reported a 14 year-old boy with urethral self-insertion of a sewing needle which was lodged in urethra for 9 years. The needle was successfully removed by urethrocystoscope with a surgical grasper. Singh *et al.*, 2014 [3] reported Multiple Impacted Urethral Metallic Needles and Screws (Foreign Bodies) Associated with Polyembolokoilamania. Albakr *et al.*, 2021 [4] reported a case of self-insertion of a large urethral foreign body with a caliber of 45F in a young gentleman. Endoscopic extraction of the foreign body was safely successful using combined percutaneous and transurethral cystoscopy. Zaghbib *et al.*, 2019 [7] reported urethral self-insertion of a sewing needle in a 14 year-old boy is very rare. Vahidi *et al.*, 2021 [11] reported a 10y/o boy, 3 hours after self-insertion of a large sewing needle in his urethra was admitted to the urology department. He had no history of mental and psychiatry disorder. Vahidi *et al.*, 2021 [11] removed a big sewing needle from the urethra through the skin without any complication for the first time.

The main objective of this case report is to diagnose these foreign bodies early and exigent removal is prudent to prevent migration and prevent urosepsis. Cystoscopy removal is successful, if early intervention is done.

LEARNING POINTS/TAKE HOME MESSAGES

The possibility of urethral foreign bodies should always kept in mind in a young patient presenting with urethral bleeding and recommend clinical examination, CT scan and cystoscopy for localization of these.

Assessment of the patient for psychiatric illness and polyembolokoilamania as psychiatric evaluation is mandatory to detect an underlying mental disorder and to avoid repeat insertion.

Severe complications such as fulminant sepsis, perforation, or even death can stem from a late presentation.

Apart from foreign body endoscopic extraction, regular follow-up should be taken into consideration to prevent recurrence, urethral trauma, and chances of infection and maintain erectile function.

REFERENCES

- Rieder, J., Brusky, J., Tran, V., Stern, K., & Aboseif, S. (2010). Review of intentionally self-inflicted, accidental and iatrogenic foreign objects in the genitourinary tract. *Urologia internationalis*, 84(4), 471-475.
- Wang, S., Wang, J., Xu, S., & Guo, K. (2021). Needle urethral self-insertion for nine years in an adolescent boy. *Urology Case Reports*, 37, 101602.
- Singh, I., Pal, A. K., & Gautam, L. (2015). Multiple impacted urethral metallic needles and screws (foreign bodies) associated with polyembolokoilamania. *Indian Journal of Surgery*, 77(1), 106-108.
- Albaker, A., Al Rumaihi, K., Al Ansari, A., & Alobaidy, A. (2021). Combined percutaneous and transurethral cystoscopy for large urethral foreign bodies: A case report and literature review. *Urology Case Reports*, 37, 101625.
- Kenney, R. D. (1988). Adolescent males who insert genitourinary foreign bodies: is psychiatric referral required?. *Urology*, 32(2), 127-129.
- Ray, R. P., Ghosh, B., & Pal, D. K. (2015). Urethral foreign body in an adolescent boy: report of two rare cases and review of literature. *International Journal of Adolescent Medicine and Health*, 27(4), 463-465.
- Zaghib, S., Ouanes, Y., Chaker, K., Chehida, M. A. B., Daly, K. M., & Noura, Y. (2019). Urethral self-inserted sewing needle in a 14-year-old boy for autoerotic stimulation. *Urology case reports*, 25, 100894.
- Rieder, J., Brusky, J., Tran, V., Stern, K., & Aboseif, S. (2010). Review of intentionally self-inflicted, accidental and iatrogenic foreign objects in the genitourinary tract. *Urologia internationalis*, 84(4), 471-475.
- Moon, S. J., Chung, J. H., Jo, J. K., Son, Y. W., Choi, H. Y., & Moon, H. S. (2010). Unusual foreign bodies in the urinary bladder and urethra due to autoerotism. *International neurourology journal*, 14(3), 186-189.
- Quin, G., & McCarthy, G. (2000). Self insertion of urethral foreign bodies. *J Accid Emerg Med*, 17(3), 231.
- Vahidi, S., Karami, H., & Gholizadeh, H. (2021). Case report: Removal of a big sewing needle from a boy's urethra from the skin for the first time. *Urology Case Reports*, 38, 101662.