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## CASE REPORT

### **A Late presentation of Gossypiboma presenting as a cutaneous fistula with purulent discharge in an operated case of Lower segment caesarean section**

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#### **Abstract**

Gossypiboma, a retained surgical sponge, is a rare complication following any surgical procedure and is primarily a result of human error. Such patients often have vague clinical presentations and the diagnosis often comes as a surprise and has serious medicolegal implications. We present a case of a 28-year-old female with a long-standing duration of 9 months with purulent discharge from the operated scar site of Lower segment caesarean section done 2 years back and then diagnosed to have a gossypiboma in the ureterovesical space causing structuring of the ipsilateral ureter which was successfully managed by Exploratory laparotomy with removal of the retained gossypiboma and right sided ureteric reimplantation.

**Keywords:** Gossypiboma, cutaneous fistula, lower segment caesarean section.

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## Introduction

The literal definition of gossypiboma means finding Surgical sponges and gauze retained in the body after a surgical procedure. This term is derived from the Latin word, Gossypium (cotton) and the Kiswahili word, boma (a place of concealment) [1]. It is often a rare clinical entity. Patients often experience symptoms for years before a definitive diagnosis is made. In most such cases, the diagnosis is unexpected and comes as a surprise [2]. Although it is an iatrogenic and preventable entity; it can be a source of significant morbidity for the patient. Another important aspect of such an inadvertent occurrence is the medicolegal implications behind it. Several such cases have been reported in the literature up until now. However, physicians seldom consider it in their differential diagnoses. We present a case of a 28-year-old female with a long-standing duration of 9 months with purulent discharge from the operated scar site of Lower segment caesarean section done 2 years back and then diagnosed to have a

gossypiboma in the ureterovesical space causing structuring of the ipsilateral ureter which was successfully managed by Exploratory laparotomy with removal of the retained gossypiboma and right sided ureteric reimplantation.

## Case report

A 28-year-old female presented to the outpatient department of a tertiary care centre with complaints of purulent discharge from abdominal wound since last 9 months. Patient reports history of 3 lower segment caesarean section in the past. The last lower segment caesarean section was done 2 years back. There was no history of wound related complications in the immediate postoperative period. After around 15 months post-surgery, patient developed a small pustule in the centre of the scar of the operated site which burst leading to purulent discharge which continued over a period of 9 months for which she visited the treating gynaecologist (Figure 1).



Figure 1. Clinical picture showing the healed abdominal scar with the site from where the purulent discharge was seen.

Patient was evaluated using ultrasound followed by Contrast enhanced Computerised Tomography of Abdomen and pelvis which revealed heterogenous mass with collection in the vesicouterine space with Right ureter seen involved by the mass and causing upstream right sided

hydrouretero-nephrosis. The imaging findings were suggestive of a retained gauze piece with pus collection in the vesico-uterine space with resultant involvement of the right sided ureter causing right sided upstream hydro-ureteronephrosis with a fistula formation (Figure 2).

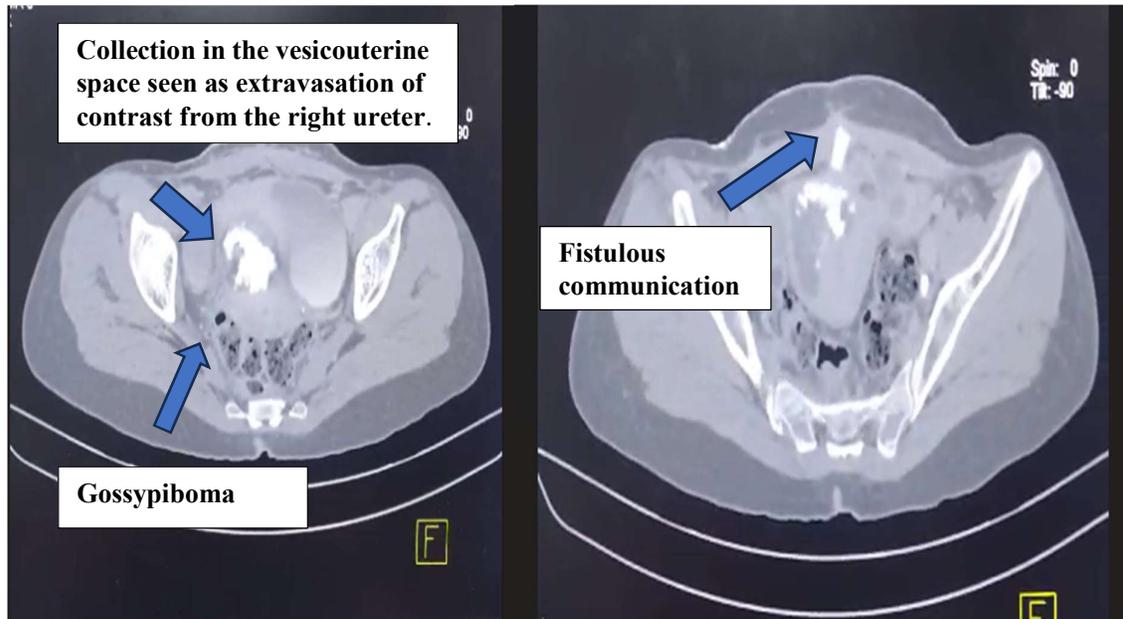


Figure 2. Contrast Enhanced Computerised scan images of the patient.

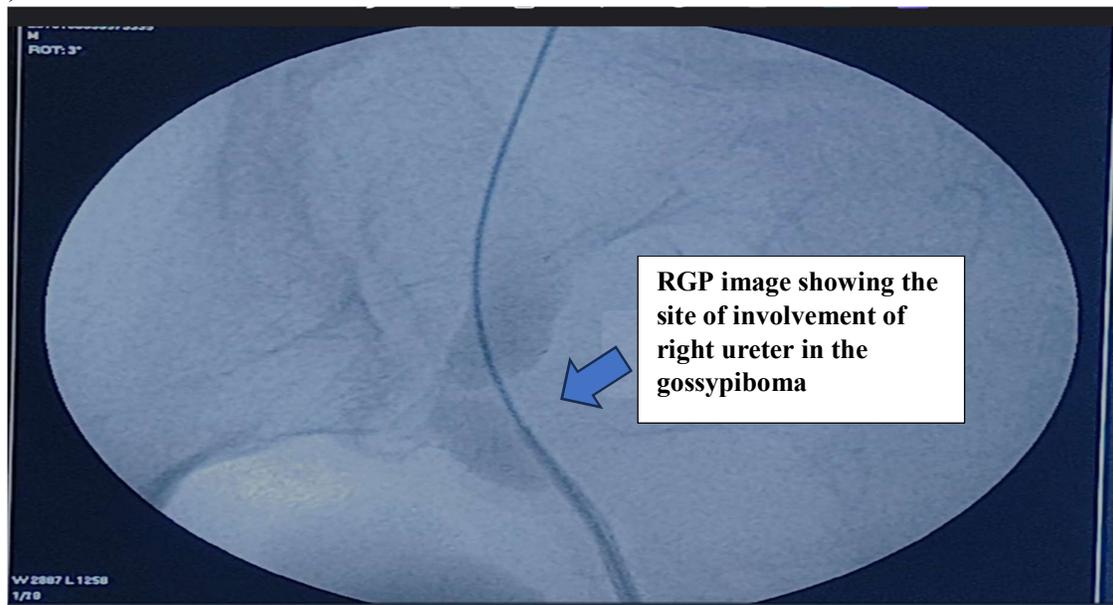


Figure 3. Retrograde pyelography image showing the site of involvement of the right ureter segment in the gossypiboma.

Patient underwent exploratory laparotomy through a lower midline vertical incision. Intraoperative, in the lower midline part the bowel was adherent to the lower abdominal wall and the bladder and the uterus. On careful dissection and separation of the bowel, the vesicouterine space was created and it was found to contain pus and retained gauze piece (gossypiboma). The right ureter was seen to

be involved in this retained gossypiboma along with pus containing cavity and was seen to be dilated proximally. The pus was drained and the retained gauze piece was removed followed by right sided ureteric reimplantation by Lisch-Gregoir technique followed by omental transposition in the uterovesical space with placement of pelvic drain. (Figures 4 to 6)

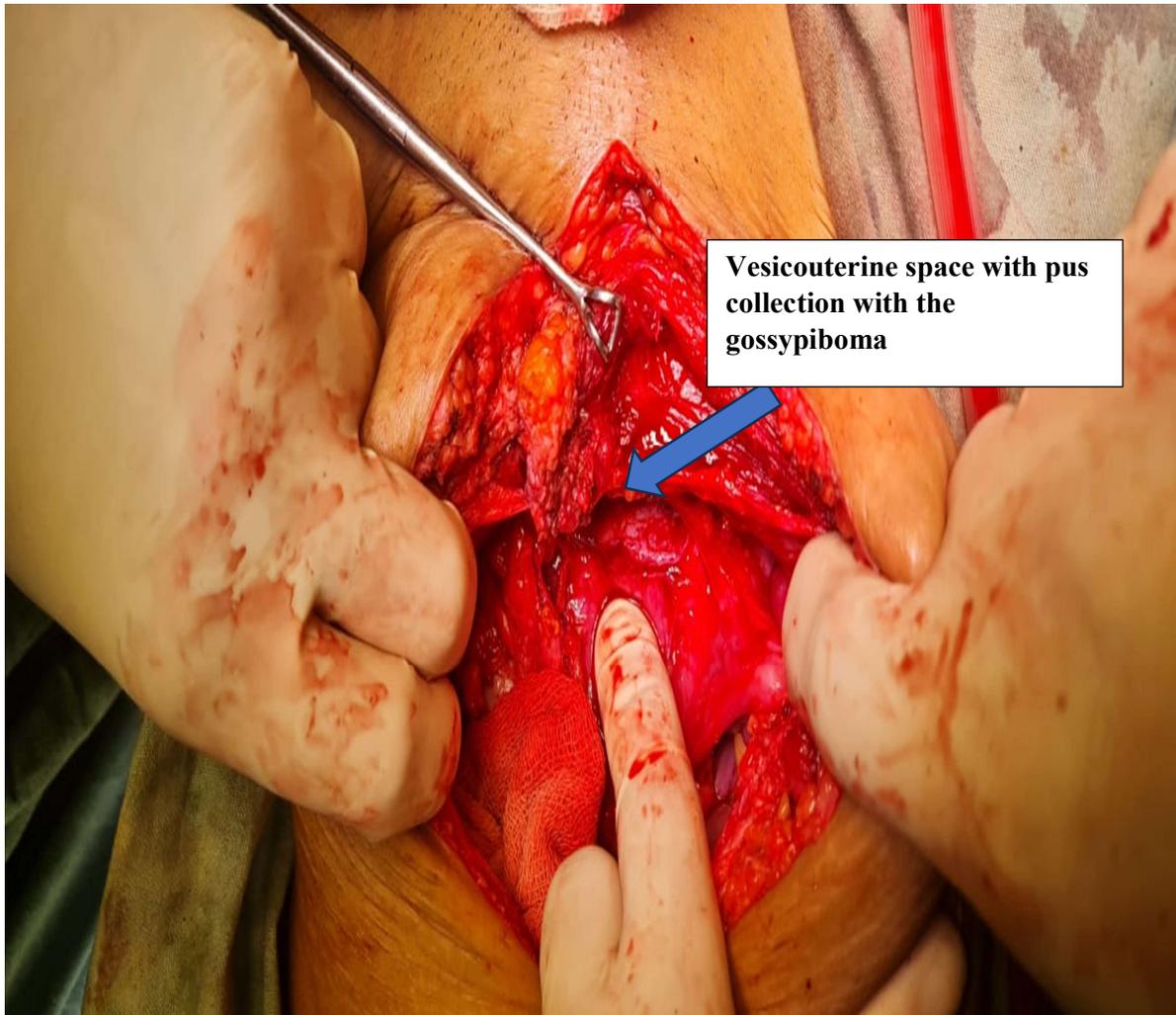


Figure 4. Intraoperative picture showing Vesicouterine space with pus collection with the gossypiboma.

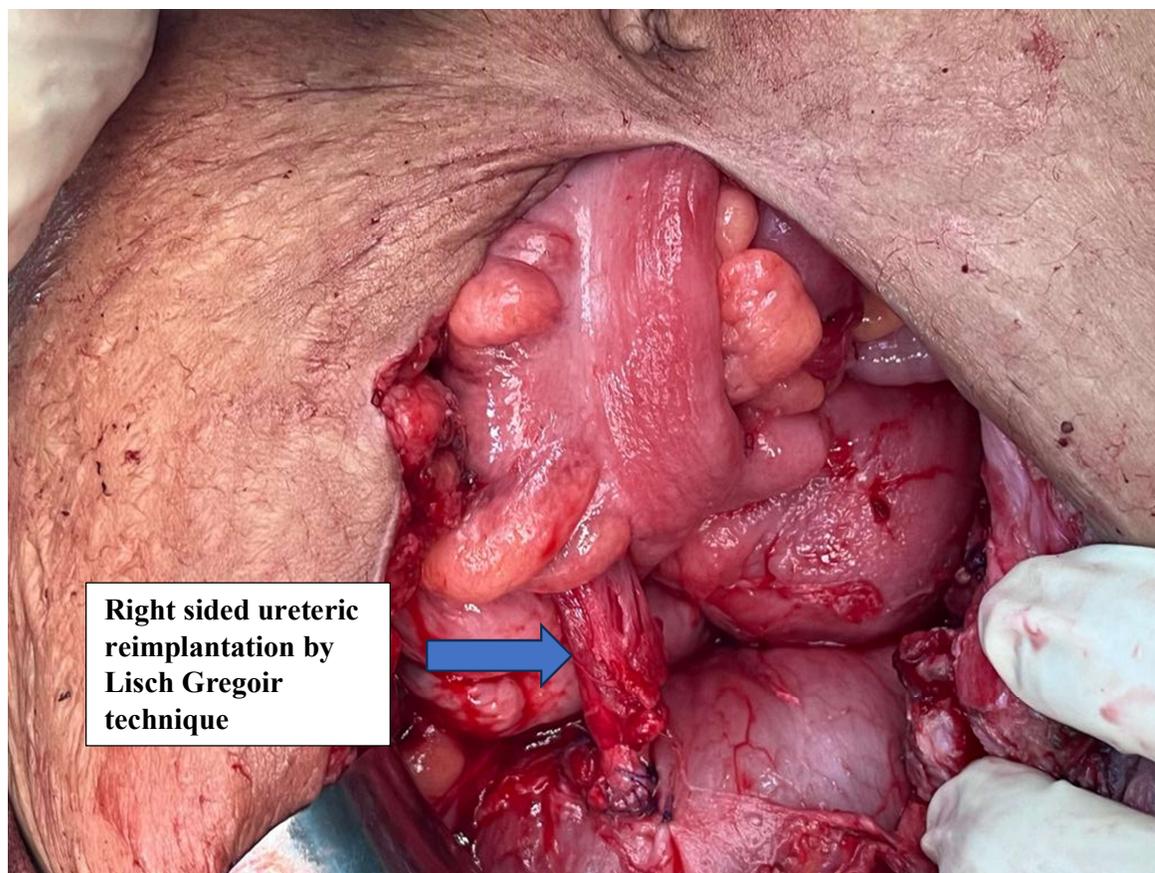


Figure 5. Intraoperative image showing Right sided ureteric reimplantation by Lisch Gregoir technique.



Figure 6. Clinical picture of the bits of the removed gossypiboma.

Patient tolerated the procedure well and was discharged after 7 days of admission. Patient underwent right sided DJ stent removal after 6 weeks and has been on regular follow up for a period of 6 months with 3 monthly ultrasound which has shown normal findings.

### **Discussion**

Gossypiboma is a condition in which every reported case in literature is a unique presentation and hence, provides a lot of valuable information and insights about what were the circumstances in which it occurred, how the patient presented with different symptoms, how it was diagnosed and finally, how it was effectively managed. Therefore, a high clinical suspicion is necessary and essential to diagnose it. Since gossypiboma is a preventable iatrogenic complication that can have detrimental effects on both patients and operating surgeon, careful measures should be made to prevent and minimize the morbidity-related complications [3].

### **Conclusion**

Gossypiboma is a rare iatrogenic disorder with substantial morbidity and significant medicolegal implications. Such incidents are wholly avoidable and prevention is far better than cure. Emergency nature of surgery and poor communication among members of the healthcare team are strongly associated with the possibility of a retained surgical sponge. Most patients with this disorder present with vague clinical features. Therefore, a high clinical suspicion is required on part of the treating physician is required in diagnosing and managing this condition.

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### **Conflict of Interest**

The authors declares that they do not have conflict of interest.

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### **Ethical approval**

Patient consent was obtained for publication of the case report.

### **Data availability**

It is a case report and data was obtained from the hospital records.

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