

New safe haven for maggots: a report of penile wound myiasis

Harkirat Singh Talwar, Vikas Kumar Panwar

Department of Urology, All India Institute of Medical Sciences, Rishikesh, Uttarakhand, India

Correspondence to
Dr Vikas Kumar Panwar;
vikaspanwar.dr@gmail.com

Accepted 31 July 2020

DESCRIPTION

Myiasis refers to the parasitic infestation of the live or dead human tissue by the larva of various fly species (maggots).¹ The dipterous flies, most commonly *Dermatobia hominis*, *Cordylobia anthropophaga* and *Chrysomya bezziana* are attracted to necrotic, purulent or sanguineous lesions and lay eggs there.¹ Lack of personal hygiene, inebriation, poor socioeconomic status, tropical climate and open wounds are the most common risk factors.²

Although urinary myiasis is well documented in literature, genital and especially penile myiasis is rare with only a few cases reported thus far.^{3,4} Some striking associations of penile myiasis include penile carcinoma and after male circumcision. We present a report of penile myiasis in advanced stages with destroyed penile tissue in an elderly homeless inebriated man with very poor hygiene.

A 64-year-old homeless emaciated man with poor personal hygiene reported to the emergency with severe maggot infestation of the genitalia. He was brought in an inebriated state with a history of recent trauma. On examination, he was found to be anorexic and smelled of urine. Careful genital examination revealed that the penis was indurated and had a typical 'moth-eaten appearance' with the dorsal and the left lateral side of the penis eaten up with slough and necrotic tissue present. There was a deep circumferential excavating ulcer of size 6×4 cm extending till the upper part of the

scrotum. Hundreds of maggots were seen infesting the ulcer (figure 1A,B; video 1). Rest of the scrotal skin was normal with palpable testes. With a view to cut the oxygen supply of the larvae, turpentine oil was used. It showed a great response with most of the larvae migrating out of the lesion. Next, the wound was thoroughly washed, and the patient was taken up for debridement under local anaesthesia. To prevent superadded secondary infection, the patient was started on intravenous ceftriaxone and metronidazole. Per urethral catheter could be negotiated easily as urethra was intact. The larva were sent for parasitological examination and were confirmed to be larvae belonging to *D. hominis*. Histopathological examination of the surrounding tissue revealed no malignancy. On follow-up the wound is healing and granulating well.

In most of the cases reported earlier, penile myiasis either presents as a nodular inflammatory lesion causing itching or as a discharging sinus.⁴ The current report suggests a form of cutaneous wound myiasis with its progression to a large excavating lesion. Treatment in these situations includes mechanical removal of all larvae, copious irrigation, debridement of all necrotic tissue and intravenous antibiotics.^{1,3} Rarely, larger lesions which require extensive debridement may need a graft/flap cover depending on the size of the raw area. Thus a seemingly naïve larva can wreak havoc especially when aided by risk factors such as warm climate, poor hygiene and filthy areas which attract flies. Early recognition of the condition and timely management remains the mainstay.

Contributors HST: Manuscript preparation, data collection, image and video. VKP: Concept, manuscript editing and validation.

Funding The authors have not declared a specific grant for this research from any funding agency in the public, commercial or not-for-profit sectors.

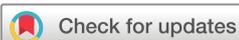
Competing interests None declared.



Figure 1 Left lateral view of the penile lesion showing excavating ulcer and necrotic tissue (A), larvae are better appreciated in the frontal view (B).

Learning points

- ▶ Penile myiasis although rare can present with complete destruction of the penile tissue and timely intervention is key.
- ▶ Treatment for advanced stages of penile myiasis include mechanical removal of all larvae, copious irrigation, debridement of all necrotic tissue and intravenous antibiotics.
- ▶ Penile myiasis is a preventable condition and requires good self-care and hygiene in addition to good vector control policies in areas.



© BMJ Publishing Group Limited 2020. No commercial re-use. See rights and permissions. Published by BMJ.

To cite: Talwar HS, Panwar VK. *BMJ Case Rep* 2020;**13**:e237762. doi:10.1136/bcr-2020-237762



Patient consent for publication Obtained.

Provenance and peer review Not commissioned; externally peer reviewed.

REFERENCES

- 1 Francesconi F, Lupi O. Myiasis. *Clin Microbiol Rev* 2012;25:79–105.
- 2 Fernandes LF, Pimenta FC, Fernandes FF. First report of human myiasis in Goiás state, Brazil: frequency of different types of myiasis, their various etiological agents, and associated factors. *J Parasitol* 2009;95:32–8.
- 3 Makarov DV, Bagga H, Gonzalgo ML. Genitourinary myiasis (maggot infestation). *Urology* 2006;68:889.
- 4 Passos MRL, Barreto NA, Varella RQ, *et al*. Penile myiasis: a case report. *Sex Transm Infect* 2004;80:183–4.

Copyright 2020 BMJ Publishing Group. All rights reserved. For permission to reuse any of this content visit <https://www.bmj.com/company/products-services/rights-and-licensing/permissions/>
BMJ Case Report Fellows may re-use this article for personal use and teaching without any further permission.

Become a Fellow of BMJ Case Reports today and you can:

- ▶ Submit as many cases as you like
- ▶ Enjoy fast sympathetic peer review and rapid publication of accepted articles
- ▶ Access all the published articles
- ▶ Re-use any of the published material for personal use and teaching without further permission

Customer Service

If you have any further queries about your subscription, please contact our customer services team on +44 (0) 207111 1105 or via email at support@bmj.com.

Visit casereports.bmj.com for more articles like this and to become a Fellow