Mucoid cyst of the penis: Case report and literature review

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Abstract

Penile cysts are uncommon lesions. In general, they are asymptomatic and do not interfere with sexual function. Most of them are present since birth, but usually they are only detectable in adolescence or adulthood. We report a rare case of a young adult man with a 5 × 5-cm nodule on the prepuce (ventral face), which appeared 2 years ago and interfered with his sexual function. The nodule was excised by circumcision and a histopathologic study was performed. Histopathologic examination revealed a mucoid cyst of penis with epidermoid metaplasia. No recurrence was observed at a 6 months follow-up and the patient's sexual function returned to normal.

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Introduction

Mucoid penile cysts are rare benign lesions. The cysts most commonly arise from ectopic urethral mucosa sequestered during embryologic development. Histopathologic examination of the cyst frequently includes stratified columnar epithelium, whether or not it is associated with mucous cells or glands.[1]

The cysts are usually small, soft and freely movable masses. In general, they are asymptomatic, unless when they are complicated by infection or difficult coitus.[2]

Case report

In the past 2 year, a 24-year-old man developed a progressively increasing nodule on his penis, which recently started to interfere with his sexual function (Fig. 1). There was no trauma or infectious history, and there was no previous surgery. On physical examination, we observed a 5 × 5-cm soft, painless and freely movable nodule on the prepuce (ventral face) (Fig. 2, Fig. 3). The lesion was excised by circumcision and a histopathologic study was performed (Fig. 4). Histopathologic examination revealed a mucoid cyst with epidermoid metaplasia. There were no postoperative complications and the patient was discharged the same day. After a 6-month follow-up, the patient did not present any sign of recurrence and had a normal sexual function.

Discussion

Mucus penile cyst is an uncommon benign lesion affecting mainly young men on ventral surface of glans penis.

Differential diagnoses include epidermal cysts, lipomas, esteatocystomas, dermoid cysts, pilonidal cysts, tyson glands

Fig. 1. Image of the penis nodule.

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Fig. 2. Penis nodule with foreskin reduced.

Fig. 3. Ventral view of the penis.

cysts and urethral diverticuluns.[2]

Several terms, including mucus cyst of the penis, genito-perineal cyst of the medium raphe, parameatal cyst, hydro-cystoma and apocrine cystadenoma of the penile shaft, should be considered synonymous.[3]

They are midline-developmental cysts that can be found anywhere from the anus to the urinary meatus. Most of them are present since birth, but usually they are only detectable on adolescence or adulthood.[4]

The cysts develop mainly on the penile ventral surface, around the glans. Usually, they are asymptomatic but can be complicated by infection, trauma or can make coitus difficult, as with the patient in this report. Surgical excision is required.[4]

Fig. 4. Nodule excised.

Conclusion

The mucoid cyst of penis is rare and can difficult the coitus. The lesion can be successfully treated by circumcision.

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