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CASE REPORT: INFECTED ADVENTITIOUS BURSA- RIGHT FOOT

General Surgery

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ABSTRACT

A bursa is an extra-articular sac that may communicate with a joint and functions to decrease friction between tendons and either bone or skin (1). Bursitis can occur from many pathological processes, most commonly resulting from chronic overuse injury.
A 63-year-old female presented with a swelling on her right foot for a duration of 1 month.
Adventitious bursitis occurs when there is chronic friction between tissues. Early detection and treatment reduce morbidity.

KEYWORDS

Bursa, Adventitious Bursa, Bursitis

INTRODUCTION

Bursae are found between the joints and overlying tissues or muscles and tendons and are small fluid-filled endothelium- lined sacks. They decrease frictional forces between structures.

Bursae can be classified as native or anatomical and non-native or adventitious bursae.

Both the anatomical and adventitious bursae may become pathological under chronic pressure and may develop thick walls, distension, inflammation, and even suppuration [2,3].

CASE REPORT

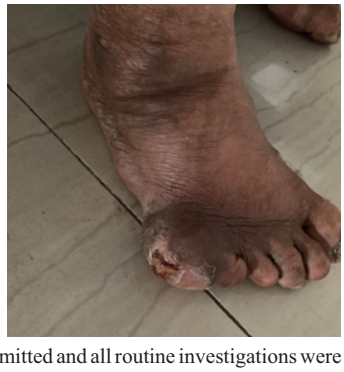
A 63-year-old woman presented to the OPD with complaints of swelling in her right foot for the past one month. It was insidious in onset, gradually progressive in size. It was associated with intermittent, pricking type of pain. There was no history of trauma, or any other significant history.

Patient was a known case of osteoarthritis of bilateral knee. Patient had no other comorbidities.

There was history of incision and drainage done at the affected site 2 weeks before presentation, but there was no decrease in size or pain.

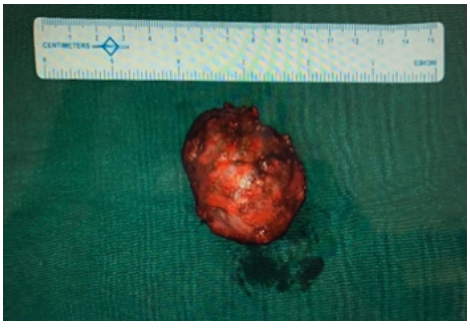
On examination, a 5x4cm, globular swelling with smooth surface, was present over the lateral aspect of the right foot near the 5th toe; it was non-mobile, variable in consistency, from soft to firm; warmth and tenderness were present, and there was no active discharge from previous surgery wound site.

There was no restriction of movement of 5th toe; Peripheral pulses were well felt.



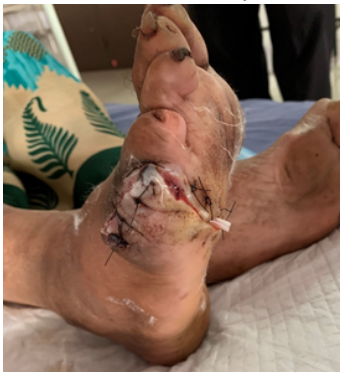
Patient was admitted and all routine investigations were done.
Laboratory investigations were within normal limits.
MRI right foot revealed irregular collection in the plantar aspect of the foot, leading to a sinus tract communicating with skin at the level inferior to 5th metatarsophalangeal joint space.

Patient was taken up for excision and biopsy under regional anaesthesia. Intraoperatively, a swelling of size 3x4cm was excised and sent for histopathology.



Histopathology reports revealed chronic bursitis.

Postoperatively, the patient was treated with IV fluids, antibiotics and analgesics. Daily dressing was done. Wound was healthy. Patient was discharged on POD 4 with an advice to follow up in 5 days. During the follow-up, the wound was found to be healthy and healing.



DISCUSSION

Bursitis is a common disease entity and could develop in every area of the body (4). The bursa tissue is a fluid-containing capsule lined with synovial cells. It can be divided into the anatomical bursa and the adventitious bursa. An adventitious bursa is created by abnormal shear force and is usually located in the subcutaneous tissue (5). A well described adventitious bursa may occur plantar to the first and fifth metatarsal heads (6).

The most commonly affected sites are over the first metatarsophalangeal joint (bunion), in front of the patella (housemaid's knee), behind the elbow (olecranon bursa) and the shoulder (subdeltoid subacromial bursitis). They can become inflamed or even infected. (7)

Anatomical Bursa:
Anatomical bursae are located usually in a particular anatomical site with a purpose of reducing friction. They are commonly found deep and adjacent to a bone or joint.

They become pathological and clinically significant when it presents with inflammation, i.e, bursitis.

Adventitious Bursa:
Adventitious bursa occurs in an unusual place or site due to friction or pressure between two layers of tissue. Once it becomes chronic it may get adherent to overlying skin or tissue underneath. It may get infected, wall gets calcified, and fluid may become thick. It is well-localised, cystic, usually non tender swelling. It becomes painful and tender if infected. Lining of bursa may become rough. The fluid may contain loose fibrinous particles to create grating sensation or crepitus on the surface. Treatment is mostly Excision and Biopsy.

REFERENCES

1. Skeletal Radiology; April 2017, Volume 46, Issue 4, pp 445–462| Cite as; Ultrasound evaluation of bursae: anatomy and pathological appearances
2. P. A. Hernandez, W. A. Hernandez, A. Hernandez, Clinical aspects of bursae and tendon sheaths of the foot; Journal of the American Podiatric Medical Association, vol. 81, no. 7, pp. 366– 372, 1991.
3. E. Steiner, L. S. Steinbach, P. Schnarkowski, P. F. J. Tirman, and H. K. Genant, "Ganglia and cysts around joints," Radiologic Clinics of North America, vol. 34, no. 2, pp. 395–425, 1996.
4. Hindawi BioMed Research International Volume 2019, Article ID 5490139, 5 pages
5.] S. Avci and U. Sayli, Lateral premalleolar bursitis as a result of sitting on the foot, Foot and Ankle International, vol. 22, no. 1, pp. 64–66, 2001
6. American Journal of Roentgenology. 2016;207: 386-391. 10.2214/AJR.15.15955.
7. Sriram Bhat's Manual of Surgery, 5TH edition; Swellings; pg. 83-85.