

Breast Abscess Following Nipple Piercing - A Rare Case

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INTRODUCTION :

Breast abscesses are defined by the formation of a purulent collection in the mammary gland or periglandular tissue.¹ They are diagnosed more frequently in breastfeeding women than in non-breastfeeding women.²

They are favored by rhagades and injuries to the areola-mammary complex.² Early prescription of antibiotic therapy in cases of mastitis has greatly reduced their frequency.³⁻⁴ Non-puerperal abscesses are favored by an anatomical anomaly (nipple inversion, ectasia of the galactophore ducts, squamous metaplasia of the lactiferous sinuses or piercing) or by general factors (diabetes, obesity, immunodepression or smoking).¹⁻⁵ .

Piercing is not a harmless act. In fact, piercing the skin creates a wound that can potentially become an entry point for bacteria, increasing the risk of infection.

CLINICAL OBSERVATION:

We report the case of a 31-year-old female patient with no notable pathological history, who had undergone breast piercing 06 months ago, and who presented with left mastodynia. On examination, a 03 cm renal mass was seen at the junction of the outer quadrants of the left breast, and when pressure was applied to the mass, frank pus was seen to be coming out through the piercing holes (**image 1**).

An ultrasound-guided drainage was performed (image 2), with a sample sent to the laboratory. The patient was put on Pyostacin 3 grams a day, and on follow-up ultrasound the abscess increased in volume (**image 3**), prompting surgical management with biopsies that returned without any particularities.



Image 1

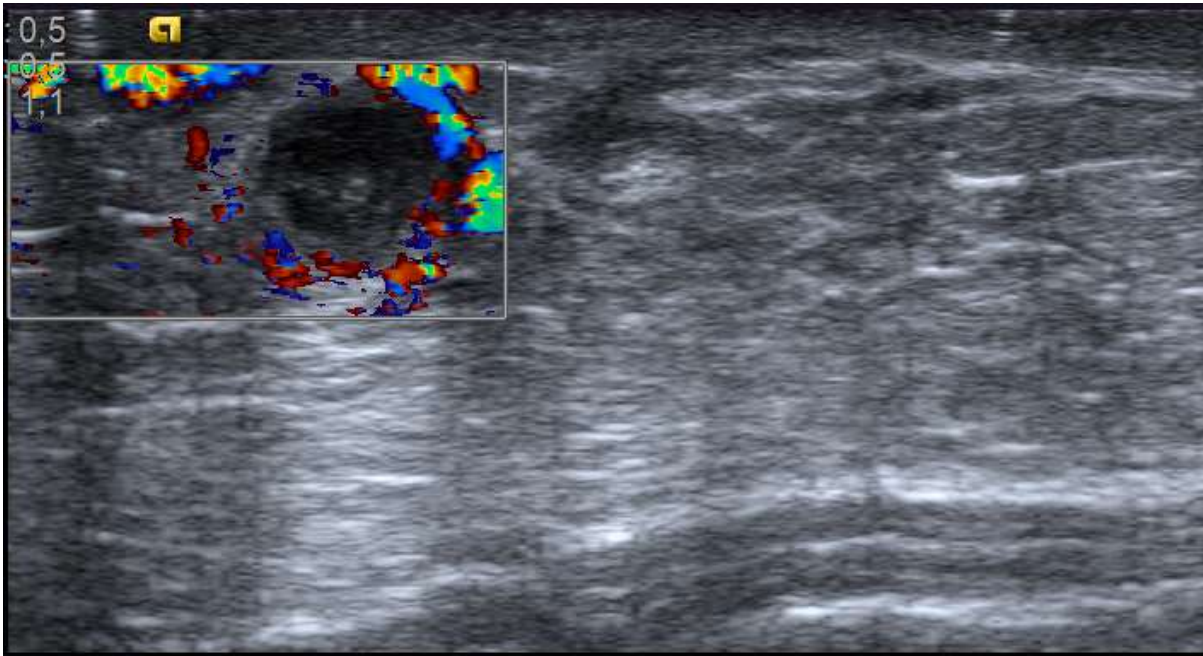


Image 2: Echo-guided drainage



Image 3: 4.5 cm breast abscess

DISCUSSION :

Ultrasound is the examination of choice for confirming the diagnosis, taking bacteriological and biopsy samples, and monitoring the evolution of lesions.¹ Doppler ultrasound has no diagnostic value.

Mammography has no place in the acute phase either;⁶ it is used if symptoms do not respond to first-line treatment.¹ The differential diagnosis is sometimes made with inflammatory cancers.⁷ The frequency of association between an abscess and a cancer varies from 2% to 20%.⁵⁻⁶ Finally, any unexplained recurrent infection should not lead us to forget breast tuberculosis.¹

First-line treatment of breast abscesses combines systemic antibiotic therapy (amoxicillin and clavulanic acid 2 x 1 g/d; erythromycin 3-4 x 250 mg/d; clindamycin 3 x 300 mg/d) with ultrasound-guided puncture-aspiration with a 14 G needle,

Surgical drainage of the abscess (in the case of a large or compartmentalized collection) or percutaneous drainage of the abscess, with bacteriological sampling and biopsy if possible, is imperative and will enable antibiotic therapy to be adapted to the antibiogram of the micro-organisms found. Breast-feeding should be continued where appropriate. Antibiotic therapy is continued for 10 to 14 days.

CONCLUSION :

Percutaneous ultrasound-guided puncture aspirations should be the first-line treatment for breast abscesses. Surgical treatment remains an option in the event of failure of conservative procedures and recurrent or chronic abscesses.

REFERENCES :

- **1** Beyrouti MI, Boujelben S, Beyrouti R, et al. Abscès pyogéniques du sein : aspects cliniques et thérapeutiques. *Gynecol Obstet Fertil* 2007;35:645-50.
- **2** Peters F. Puerperale Mastitis : Empfehlungen für Diagnostik und Therapie. *Senologie* 2009;6:227-30.
- **3** Dixon JM. Breast infection. *BMJ* 1994;309:947-9.
- **4** Berna JD, Madrigal M, Berna-Serna JD. Percutaneous management of breast abscesses : An experience of 39 cases. *Ultrasound Med Biol* 2004;30:1-6.
- **5** Friedolf P, Anja K, Volker P. Coincidence of non puerperal mastitis and non inflammatory breast cancer. *Eur J Obstet Gynecol Reprod Biol* 2002;105:59-63.
- **6** Ulitzsch D, Nyman MK, Carlson RA. Breast abscess in lactating women : US-guided treatment. *Radiology* 2004;232:904-9.