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Clinical case

Fasciitis necrotizing of the parietogenital wall by fistulization of an appendicular abscess: about a case

Fasciite nécrosante de la paroi pariéto-génitale par fistulisation d'un abcès appendiculaire : à propos d'un cas

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Résumé

Objectif : Nous rapportons un cas inhabituel de fasciite nécrosante pariéto-génitale par fistulisation d'un abcès appendiculaire.

Patient de 52 ans reçu aux urgences pour une douleur localisée à la fosse iliaque droite évoluant depuis une semaine. Il avait les antécédents de HTA et de diabète de type 2. Il présentait de la fièvre et de vomissement. L'examen clinique retrouvait une défense à la fosse iliaque droite, un empâtement allant de l'aile iliaque à 7 cm de l'ombilic, douloureux à la palpation. Une TDM abdominale a été réalisée et a mis en évidence un abcès appendiculaire avec une infiltration de la paroi antéro-latérale de l'abdomen. Un drainage de l'abcès a été réalisé par voie laparoscopique associé à une appendicectomie dont la pièce a été adressée à l'histologie. Les suites opératoires étaient marquées par une fasciite nécrosante. Une mise à plat de l'abcès, une nécrosectomie et un drainage ont été réalisés. Le résultat est satisfaisant pour un recul de 6 mois.

Mots-clés : abcès appendiculaire, fistule pariétale et fasciite nécrosante (Abidjan, Côte d'Ivoire).

Abstract

Objective: We report an unusual case of parieto-genital necrotizing fasciitis through fistulization of an appendicular abscess.

Patient 52 years of age received in the emergency room for a pain localized to the right iliac fossa evolving for a week. He had a history of hypertension and type 2 diabetes. He had fever and vomiting. The clinical examination found a defence to the right iliac fossa, an impasto ranging from the iliac wing to 7 cm from the umbilicus, painful to palpation. Abdominal CT was performed and showed appendicular abscess with infiltration of the anterolateral wall of the abdomen. A drainage of the abscess was performed laparoscopic associated with an appendectomy whose part was addressed to histology. The postoperative course was marked by necrotizing fasciitis. A flat abscess, necrosectomy and drainage were performed. The result is satisfactory for a decline of 6 months.

Keywords: appendicular abscess, parietal fistula and necrotizing fasciitis (Abidjan, Ivory Coast).

Introduction

Appendicular abscess accounts for 10% of acute adult appendicitis in Africa. The risk of contamination of the peritoneal cavity in the form of peritonitis in time (1) makes it a special case. Most abdominal wall abscesses are associated with surgical procedures, but can rarely occur with intra-abdominal inflammation (2). Their complication by necrotizing fasciitis through fistulization to the abdominal wall is rare.

Clinical case

A 52-year-old man was admitted to the emergency department with abdominal pain and vomiting that had been progressing for a week. He had a history of hypertension and type 2 diabetes. On admission, his blood pressure was 179/92 mmHg, pulse 106 beats per minute and temperature 38°c.

Clinically, he presented with pulsatile, insomniac right iliac fossa pain and morbid obesity with a Body Mass Index of 38.5, iliac fossa defensiveness and impasto.

Biological data showed hyperleukocytosis (22400/mm3), elevated C-reactive protein (327.56 mg/l) and hyperglycemia (2.69 g/l), glycated hemoglobin (10%), creatinine (22.00 mg/l); urea (1.59 g/l). CT scan of the abdomen revealed an abscess measuring 72x56 mm in contact with the appendix measuring 12 mm thick, thickening of the colonic wall and infiltration of the muscular wall.fig.1

He was given an infusion of analgesics (paracetamol), antibiotics (ceftriaxone injection 2 grams/24 hours), rehydration and a nasogastric tube.

The indication for surgery was given as a matter of urgency. The abscess was drained, and a laparoscopic appendectomy was performed, with placement of a #12 suction drain. Culture of the abscess revealed Escherichia coli. The immediate post-operative course was marked by increased pain and swelling in the right iliac fossa, extending to the inguinal region and the penis.Fig.2

In view of persistent pain and necrosis of the skin of the penis, an abdominal CT scan was performed, revealing right parietal emphysema associated with wall superinfection and infiltration of mesenteric fat. Anatomopathological examination confirmed suppurative appendicitis with parietal infiltration and no sign of malignancy. Post-operative management was straightforward, and the patient was discharged 10 days later. The wound on the penis healed 6 weeks after discharge.

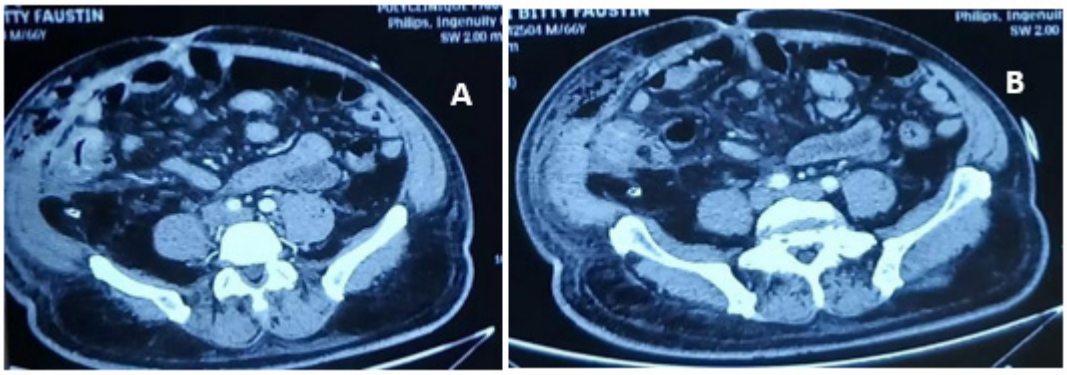


Fig1 A: appendicular abscess in contact with the wall and thickening of the colonic wall
B: infiltration of the abdominal wall in contact with the intra-abdominal collection



Figure 2: Impaction of the flank and inguinal region with necrotizing fasciitis of the penis

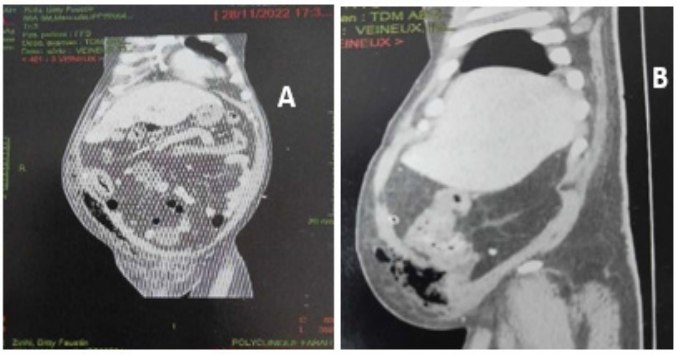


Figure 3: A and B coronal and sagittal sections showing parietal emphysema indicating superinfection of the abdominal wall.



Figure 4: A and B: debridement of fasciitis of the bank and flattening of the flank collection with drainage by Delbet blades; b: wound scarring.

Discussion

Parieto-genital fasciitis due to fistulization of the wall of an appendicular abscess is not a diagnosis that springs to mind when a patient presents with lateral impaction, given its rarity and non-specific manifestation.

Clinical symptoms are essentially pain, tenderness and swelling of the right iliac fossa. However, diagnosis with other causes of abscesses (1,3,4). Consequently, the diagnosis of certainty is made by medical imaging. The indolent nature of early necrotizing fasciitis and its non-specific general clinical signs can considerably delay diagnosis. Sometimes, the overlying skin is completely intact, with inflammation, edema and underlying necrosis only later followed by secondary necrosis of the skin (5). In the literature, diabetes is reported as one of the most common predispositions.

The therapeutic strategy to adopt in the event of appendicular abscess remains debated. Necrotizing fasciitis through fistulization of an appendicular abscess in the wall is very rare. In the literature, we note one case reported by Lin et al (3). In our case, the CT scan was sufficient to diagnose this parietal emphysema. However, necrotizing fasciitis was diagnosed, confirmed by the germs found, which are responsible for necrotizing fasciitis (5).

To date, laparoscopy remains controversial in terms of its advantages over the open approach. The surgeon's experience plays an important role in this practice. Operative success in complicated appendicitis depends on diligent intra-abdominal lavage (particularly the pouch of Douglas, subhepatic, subphrenic, and right parietocolic gutter), placement of the drain in the Douglas space for drainage, postoperative lavage, and safe removal of the appendix. Resumption of bowel transit was significantly faster and hospital stay significantly shorter in patients treated laparoscopically (6).

The results of the literature show the benefits of minimally invasive surgery.

However, primary perforated appendicitis was

initially considered a contraindication to laparoscopic appendectomy (6). In diabetic patients with metabolic disorders, a positive diagnosis and the decision to perform a laparotomy are difficult problems, often complicated, with a negative influence on the evolution and prognosis of these patients. (7)
Early and immediate treatment usually leads to a favorable outcome. In our case, however, the course was marked by necrotizing fasciitis of the dorsal surface of the penis.

Conclusion

Appendicular abscesses are increasingly frequent complications of appendicitis, but their complication by parieto-genital necrotizing fasciitis with fistulization to the anterior- lateral wall and the penis is rare. The use of computed tomography (CT) allows early diagnosis and facilitates treatment, all of which contribute significantly to patient survival.

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Conflict of interest : None

References

[1] Leroy GM, Samuel T, Alain C, Christopher PT, Faustin T, Markus F. Abcès appendiculaires : analyse de 19 cas traités au Centre Hospitalier et Universitaire de Yaoundé et déductions pratiques. Pan African, Médical Journal, juin 2010: 1-9

[2] Doran H, Pătraşcu T, Păcescu E, Marin I, Radu C. [Acute abdomen and diabetic patients--difficulties of diagnosis and therapeutical decision]. Chirurgia (Bucur). 2001;96(1):81-4.

[3] Lin YY, Tsai SH, Chu SJ. Abdominal Wall Abscess in a Diabetic Patient With Ruptured Appendicitis. Journal of Trauma : Injury, Infection & Critical Care. Août 2008;65(2):492.

[4] Baudain P, Coupris L, Revillon Y, Sauvegrain J. [Appendicular abcess presenting as an abdominal mass in early childhood. Radiological diagnosis (author's transl)]. J Radiol Electrol Med Nucl. 1977;58(6-7):445-9.

[5] Wysoki MG, Santora TA, Shah RM, Friedman AC. Necrotizing fasciitis : CT characteristics. Radiology. Juin 1997;203(3):859-63.

[6] Bittner R. Laparoscopic surgery--15 years after clinical introduction. World J Surg. juill 2006;30(7):1190-203.

[7] Doran H, Pătraşcu T, Păcescu E, Marin I, Radu C. [Acute abdomen and diabetic patients--difficulties of diagnosis and therapeutical decision. Chirurgia (Bucur). 1 janv 2001;96(1):81-4.

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