ISOLATED RETROVESICAL HYDATID CYST

KYSTE HYDATIQUE RETROVESICAL ISOLE

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Abstract :

The hydatid cyst is an ubiquitous disease in our country. Its isolated retrovesical location is rare.We report a case of pelvic hydatid cyst in a patient exhibiting lower urinarytract symptoms. All imaging modalities revealed a cystic mass containing small morsels cysts located between the urinary bladder and the rectum. Its characteristics led us to suspect the presence of a hydatid cyst. The treatment is basically based on surgery associated with medical treatment. Hydatid cyst should always be suspected in the differential diagnosis of abdominopelvic masses in endemic regions.

Key words: Hydatid cyst; Masses; Retrovesical.

Résumé :

Le kyste hydatique est une maladie endémique dans notre pays. Le siège retro vésical isolé du kyste hydatique est rare. Nous rapportons un cas de kyste hydatique pelvien chez un patient présentant des symptômes du bas appareil urinaire. L'imagerie a révélé une masse kystique de siège retro vésical contenant de petites vésicules filles. Ces caractéristiques radiologiques nous ont amenés à soupçonner la nature hydatique de ce kyste. Le traitement était principalement chirurgical associé a un traitement médical. Le kyste hydatique doit toujours être évoqué devant les masses abdominopelviennes dans les régions où sévit la maladie hydatique.

Mots clés : Kyste hydatique ; Masses ; Rétrovésical

ملخص :

الكيس العداري مرض متوطن في بلدنا. يعتبر وجود هذا الكيس بصفة معزولة خلف المثانة أمر نادر الحدوث.
نقوم بالتبليغ عن حالة لكيس عداري في الحوض لدى مريض يحمل أعراض المسالك البولية السفلية. وكشف التصوير كتلة كيسية خلف المثانة و التي تحتوي على حويصلات فتاتية صغيرة. وقد أدت هذه الخصائص الإشعاعية لنا للشك في الطبيعة العدارية لهذا الكيس. والعلاج يعتمد في المقام الأول على العلاج الجراحي معزز بالعلاج الطبي. وينبغي الشك في الكيس العداري دائما عند وجود كتلة بطنية حوضية في المناطق التي يوجد فيها المرض العداري.

الكلمات المفاتيح : الكيس العداري ; الكتل ; خلف المثانة .

INTRODUCTION

Hydatid disease is spread in an endemic form in some countries and stands out as a really serious public health problem. There are different types of such disease, among which the one occuring in the pelvis and/or lower urinary tract which is very rare.

OBSERVATION

A 63 year-old farmer was followed foran acutebladder retention which required the implementation of an indwelling bladder catheter. The digital rectal examination revealedthe presence of a lower pole of a renitent mass protruded from the pouch of Douglas. The liver, the lung and other abdominal organs were completely normal, both on US and x-rays exams. The intravenous pyelogram(fig n°1), and the Pelvic ultrasonographyshowed a multi-partitionedcystic picture of the retro bladder site, leading to a hydatid cyst type III according to Gharbi classification (fig n°2). Chest x-rays, abdominal ultrasonography and biological investigation did not reveal further abnormalities.The patient had first undergone a suprapubic operation. After cleaning up the surgical site with a hypertonic serum then with hydrogen peroxide and after removing the cystic content, a total cystopericystectomy was conducted.The surgical operation was completed by the introduction of a drainage tube into the sub-peritoneal residual cavity. The patient left the hospital three days later without complications. Five years later, we noticed neither any its recurrence nor new locations of this disease.

DISCUSSION

Hydatid disease is a frequent parasitic disease in our country. Itrepresents an endemic disease in Tunisia. the surgical incidence is 15/100000 inhabitants[1].

It is caused by the development of a larval form of a zoonotic parasite known as echinococcus Granulosus [2]. The localisation can be primitive following the hematogenous spread of embryos and their development in the retrovesical space [3], or rarely by the lymphatic system by borrowing the venous system of Retzius and Schmiedel's anastomosis[1].

In most cases, coexistent cysts are detected elsewhere, usually in the liver. Only a few cases of retrovesical primary pelvic hydatid cyst have been reported, and primary pelvic involvement is exceedingly rare.

A retrovesical hydatid cyst produces symptoms by the effect of the mass on the adjacentorgans, Including the bladder. This disease has a slow and silent evolution. Clinical signs are usually late-onset and are dominated by palpation of a retropubic mass and compressive events like the signs of bladder irritation and acute urinary retention[4].Hydatiduria is pathognomonic, rare symptom and sign acracking of the cyst in the bladder [5,6].

The diagnosis of hydatid cyst is mainly based on the ultrasound analysis to specify the location of the cyst, its vascular relations and the existence of other sites. Furthermore it allows the recognition of 5 types of hydatid cyst according to Gharbi et al. [7,8]. Ultrasonography sometimes reveals that daughter cysts confirms hydatidosis purpose, except for this multilocular appearance, the lesion can be uniloculated, heterogeneous or even solid.

The intravenous urography (IVU) mainly allowsthe assessment of the impact of this mass on the upper urinary tract [1].

The tomodensitometry is the reference examination in diagnosing retrovesical cyst. The typical finding on computerized tomography (CT) is a unilocular or multilocular cyst with a well defined wall enhancing contrast medium and with occasional calcification[5,6]. The topography of the cyst is well appreciated because it allows a more detailed analysis of the wall of the cyst and its content, it is highly sensitive in detecting small calcifications cysts, it permits accurate search of other locations especially peritoneal ones and it is useful when an ovarian tumor is suspected after an ultrasound analysis (cyst stage II and III)[1,9].

Serology, although moderately sensitive in extrahepatic locations [10], can bring a great contribution in the diagnosis of retroperitoneal and retrovesical hydatid cysts, especially when the ultrasound images are not typical [11,12] . However, it does not help in diagnostic unless it is positive and, thus, confirms the diagnosis before surgery.

Preoperative Albendazole treatment decreases the viability of the hydatid cysts, but the duration of the treatment is controversial; it begins 5 to 20 days before surgery and spread out over 3 to 7 months in a monthly cyclic form to prevent a secondary hydatidosis [13,14].

The treatment of the cyst is surgical. It consists of an injection of a scolicidalsolution

(hypertonic serum or hydrogen peroxide at 10 volumes) for 10 minutes and drain the cyst content after protecting the operative field by soaked fieldsin the scolicidal solution[15]. The technique of choice is total cysto-pericystectomy[15]. The latter can be held partially ,respecting, thus, the maximum of peri-cyst and sparing the plates in contact with susceptibleareas such as the ureters, blood vessels or the gastrointestinal tract[1,15].
Monitoring is needed to detect any recurrence as early as possible and it is based on abdomino-pelvic US and immunology monitoring for years so as to detect any possible recurrence[5,15].

CONCLUSION

The location of Isolated Retrovesical Hydatid Cyst is very rare. Clinical signs are discreteand occur at a late stage of the cyst development. The ultrasound analysis / CT allows a positive diagnosis and a full assessment of the lesions. In endemic areas, any retrovesical mass should evoke hydatid cyst screening. The treatment of choice is total cysto-pericystectomy. The monitoring is **based on the abdominal pelvic ultrasound.**

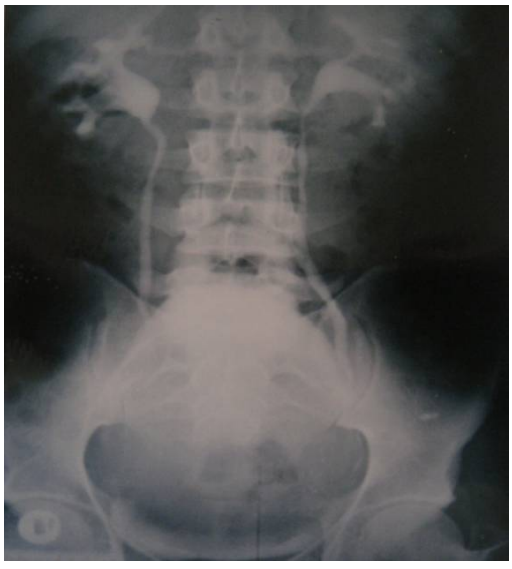

Fig 1: Intravenous urography showing a bladder compression by the cyst

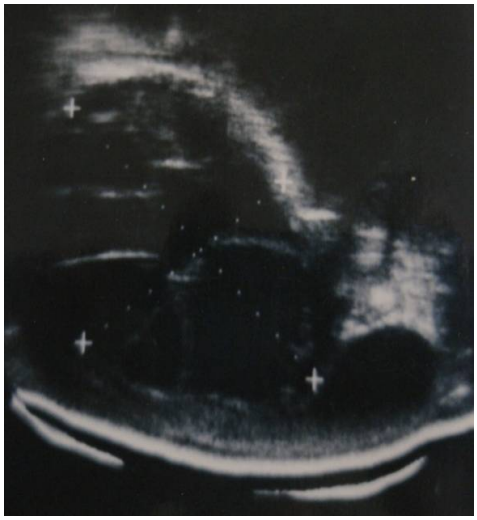

Fig N°2 : The pelvic ultrasound showing a multi-locular hydatid cyst type III according to the classification of Gharbi

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