НАУКА

PIGMENTED NODULAR CYSTIC HIDRADENOMA OF THE ANKLE

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Nodular, solid-cystic hidradenoma is a benign cutaneous tumor with eccrine or apocrine sweat gland origin that is most commonly found in the head, neck, trunk, and upper extremity regions of patients in the middle to older aged groups. The legs are involved only in 4.5%, while the feet become rarely affected [1]. Majority of these tumors are asymptomatic, slow-growing, solitary, and nonulcerative in presentation [2,3]. Hyperpigmentation is a rare feature of these benign tumors and may be due to mechanical friction [4].

Nodular hidradenomas represent a dermatological pitfall, being difficult to differentiate clinically and dermoscopically from basal cell carcinoma (BCC) and melanoma [5].

Case Report. We report on a 53-year-old man, presented with a firm, bluish nodule on his left ankle that developed over several months (Fig. 1). He was otherwise healthy and was without any medication. He did not remember a trauma at the site of the lesion.

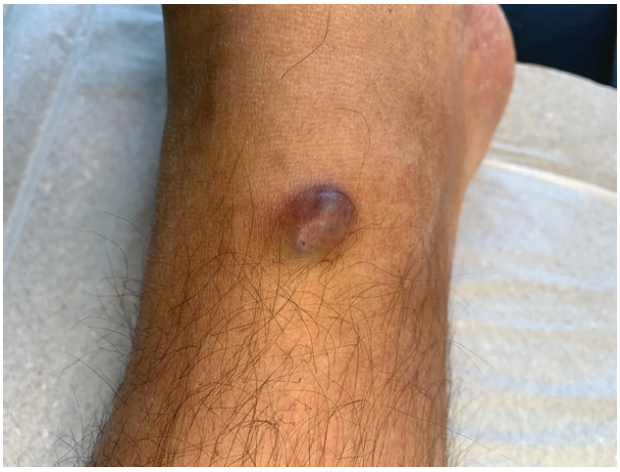

Fig. 1. Hyperpigmented nodular hidradenoma of the ankle

The 1 cm large nodule was not painful but mobile to the underlying tissue. We suspected a thrombosed hemangioma. For the differential diagnosis we considered ruling out an atypical pilomatricoma, a pigmented basal cell carcinoma, and a ganglion cyst with bleeding.

The lesion was completely removed surgically and the defect was closed by a tissue advancement flap. Healing was unremarkable. Histologically we found a well circumscribed solid cystic dermal tumor with signs of bleeding and tissue necrosis. The nodule was composed mainly of eosinophilic cells and some clear cells. There was no cellular or nuclear atypia, no increased mitotic activity. The stroma was myxoid (Fig. 2a & b). The overlying epidermis appeared slightly hyperpigmented, possibly due to mechanical friction.

The diagnosis of a benign nodular solid-cystic hidradenoma was confirmed.

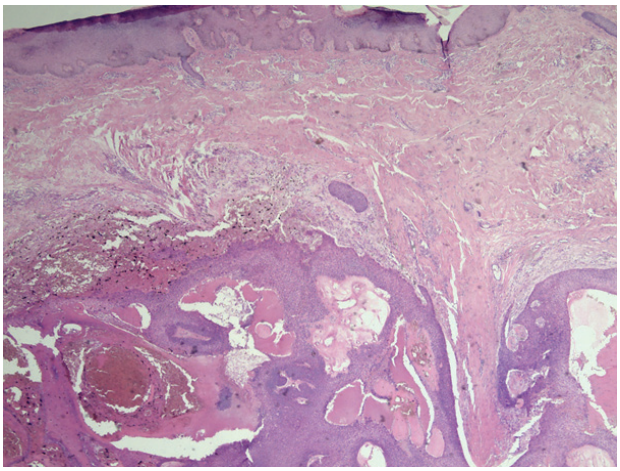

Fig. 2. Nodular solid-cystic hidradenoma. A well-circumscribed dermal epithelial tumor with a myxoid stroma (hematoxylin-eosin, x 2)

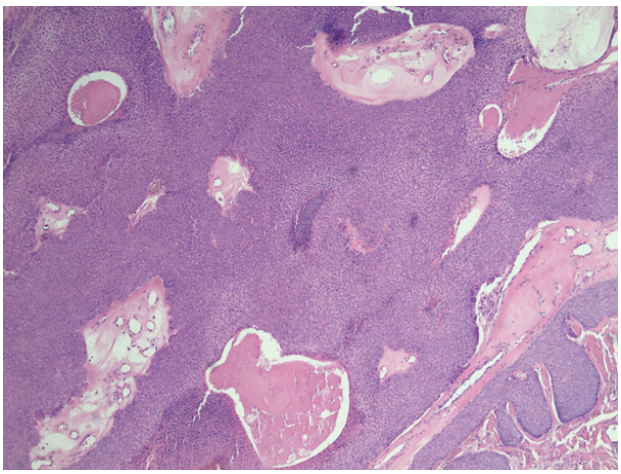

Fig. 3: Closer view. No mitotic activity can be seen. Some spaces filled with blood (hematoxylin-eosin, x 4)

Results and discussion. Hidradenoma (syn. acrospiroma) is a benign adnexal tumor with eccrine or apocrine differentiation. Most of the lesions are asymptomatic and solitary. The pathogenesis of hidradenomas – eccrine and apocrine – is poorly understood. A trauma is reported in ¼ of cases. Recently, *CRTC-MAML* fusion gene was reported in hidradenomas, with CRTC1-MALM2 fusion transcript being demonstrated in approximately 26% to 50% of cases, while *CRTC3-MAML2* fusion was seen in about 5% of tumors. CRTC1-MAML2 constitutively activates CREB-mediated transcription and has shown an oncogenic potential *in vitro* [6].

Histologically, most nodular hidradenomas are dermal circumscribed, solid and cystic, symmetrical, lobulated tumors with a sheet-like and papillary architecture. They may present with a pseudocapsule of compressed and hyalinized collagen bundles. Cells are round or polygonal, mostly eosinophilic. Clear cells are rich in glycogen and present an apocrine differentiation. Squamous differentiation and sebaceous differentiation are common, while poroid differentiation is rare. The stroma can be myxoid, fibrous or mixed [7]. Malignant transformation of nodular hidradenoma is quite rare, but these tumors are aggressive [8].

Differential diagnoses of solid nodular hidradenoma include BCC, squamous cell carcinoma, melanoma, breast cancer, digital ganglion cyst, and digital papillary adenocarcinoma, depending on the anatomical region [9-12]. As in our case, a hyperpigmented hidradenoma is even more difficult to diagnose solely on clinical findings. Hidradenoma of the ankle is very rare. We found only one case of a clear cell hidradenoma on the ankle in the English literature [13].

Hidradenoma should be considered as a possible differential diagnosis in case of pigmented soft tissue tumors of the ankle.

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SUMMARY

PIGMENTED NODULAR CYSTIC HIDRADENOMA OF THE ANKLE

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Solid-cystic hidradenoma is a benign cutaneous tumor that is most commonly found in the head, neck, trunk, and upper extremity regions of patients in the middle to older aged groups. Presentation on lower extremities and in particular on the foot is uncommon. Nodular hidradenomas represent a dermatological pitfall, being difficult to differentiate from basal cell carcinoma and melanoma. We report on a 53-year-old male patient with a pigmented nodular hidradenoma on his ankle that was surgically removed. We discuss histopathology and differential diagnosis of this eccrine tumor of skin. This is the second reported case in the English literature.

Keywords: pigmented nodular cystic hidradenoma.

РЕЗЮМЕ

ПИГМЕНТИРОВАННАЯ УЗЛОВАТАЯ КИСТОЗНАЯ ГИДРАДЕНОМА ОБЛАСТИ ЛОДЫЖКИ

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Солидно-кистозная гидраденома является доброкачественной кожной опухолью, которая чаще всего встречается в областях головы, шеи, туловища и верхних конечностей среди пациентов в группах среднего и старшего возраста. Ло-

кализация на нижних конечностях, особенно в области стопы, встречается редко. Узловые гидраденомы представляют собой диагностическую дилемму в дерматологии, поскольку их трудно отличить от базальноклеточного рака и меланомы. Авторами представлен клинический случай 53-летнего пациента мужского пола с пигментированной узловатой гидраденомой области лодыжки, которая была удалена хирургическим путем. В статье обсуждаются аспекты гистопатологии и дифференциальной диагностики этой эккринной опухоли кожи. Это второй случай, о котором сообщается в англоязычной литературе.

რეზიუმე

პიგმენტირებული კვანძოვანი კისტოზური ჰიდრადენომა კოჭის არეში

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[1]აკადემიური სასწავლო ჰოსპიტალი, დრეზდენის საქალაქო საავადმყოფო, დერმატოლოგიის და ალერგოლოგიის დეპარტამენტი, დრეზდენი; [2]პათოლოგიის ინსტიტუტი "გეორგ შმორლ", დრეზდენის საქალაქო საავადმყოფო, აკადემიური სასწავლო ჰოსპიტალი, დრეზდენი, გერმანია; [3]გოლდმანის კლინიკა და ჰოსპიტალი მოინიუშ-დე-ვენტო, პორტო ალეგრე, ბრაზილია

სოლიდურ-კისტოზური ჰიდრადენომა წარმოადგენს კანის კეთილთვისებიან სიმსივნეს, რომელიც ძირითადად გხვდება თავის, კისრის, ტანის და ძედა კიდურების არეში საშუალო და ხანდაზმული ასაკის პაციენტებში, ლოკალიზაცია ქვედა კიდურებზე, განსაკუთრების ტერფის არეში, ძალიან იშვიათია. კვანძოვანი ჰიდრადენომების დიაგნოსტიკა წარმოადგენს დერმატოლოგიის დილემას, ვინაიდან ძნელად განსხვავდება ბაზალურ-უჯრედული კიბოსა და მელანომისაგან.

ავტორების მიერ წარმოადგენილია 53 წლის მამრობითი სქესის პაციენტის კლინიკური შემთხვევა პიგმენტირებული კვანძოვანი ჰიდრადენომით კოჭის არეში, რომელიც ამოკვეთილი იყო ქირურგიული გზით. სტატიაში გაანალიზებულია კანის ეკრინული სიმსივნის ჰისტოპათოლოგიური და დიფერენციალური დიაგნოსტიკის ასპექტები. აღწერილი შემთხვევის შესახებ ინფორმაცია მოლოდ მეორეა, რომელიც წარმოდგენილია ინგლისურენოვან ლიტერატურაში.

OPEN RYGB LONG-TERM COMPLICATIONS: VENTRAL HERNIA - REPORT ON A 10-YEAR SINGLE-CENTER EXPERIENCE

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IIncisional hernia is the protrusion of the abdominal contents through an orifice – a defect of the abdominal wall where it previously underwent surgery due to possible healing alterations caused by inflammation or lack of substrate for adequate closure of the wound [4,8,10,13,28]. Current papers show the incidence of incisional hernia in non-obese patients at the rate of 10-15%. There is an increased incidence rate of over 25-30% in morbid obese patients, probably related to the lower amount of collagen [10], and the recurrence can increase up to 67% when the repair is performed without a mesh insert [3].

The closure defect is more frequent in vertical incisions in the median line in its infra-umbilical portion [4,8]. Incisions in the median line are commonly used in the open Roux-en-Y gastric bypass (RYGB) [18]. Although videolaparoscopic RYGB are preferred by recent studies [27], open RYGB are still very useful, especially in low-middle income countries, by its significant lower equipment investment, costing around 50% less than the laparoscopic or robotic RYGB [11].

We report the epidemiology and intervention of a 10-year experience of a single center applying sublay retromuscular Rives/Stoppa technique repair in patients with incisional ventral hernia of open RYGB. We hypothesize if there are any apparent risk factors to the abdominal wall compromise and if the surgical treatment outcome were different from the literature. We identified in the sample a predominance of female patients and high BMI at the moment of bariatric surgery as well as we identified low recurrence rate and length-of-stay at the hospital compared to the literature.

Material and methods. This study consists of a retrospective analysis of patients who underwent open Roux-en-Y gastric bypass from January 2006 to December 2015 in a single-center brazilian hospital. The same medical group performed the surgery and the incisional hernia repair. The data included here consists of demographics, body mass index (BMI), and hernia characteristics such as status of natural history (elective or urgency surgery). Short-and long-term follow up data consisted