Facial miliary osteoma in HIV patient *

Osteoma miliar da face em paciente portadora do HIV

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Abstract: Facial miliary osteoma is characterized by the presence of multiple normochromic papules, affecting mainly middle-aged women, with a previous history of acne. A 39-year-old HIV positive female patient presented hardened papules which had appeared 3 years before, located on the malar region, glabella and mentum. Optical microscopy showed spherical bone formations in the dermis. Computerized tomography of the face revealed small calcifications on the surface consistent with bone formation. Multiple facial osteomas are rare as well as its association with HIV virus infection.
Keywords: HIV; Osteoma; Skin neoplasms

Resumo: Os osteomas miliares da face são caracterizados por múltiplas pápulas normocrômicas na face, afetando, geralmente, mulheres de meia idade, com história pregressa de acne. Uma paciente de 39 anos, portadora do HIV, apresentou pápulas endurecidas, com 3 anos de evolução, localizadas na região malar, glabela e mento. A microscopia óptica demonstrou formações ósseas esféricas na derme. A tomografia computadorizada da face observou pequenas calcificações na superfície, compatíveis com formação óssea. Os osteomas múltiplos da face são raros assim como sua associação com a infecção pelo HIV.
Palavras-chave: HIV; Neoplasias cutâneas; Osteoma

INTRODUCTION

Osteoma cutis is a rare disease, characterized by bone formation in the cutaneous and subcutaneous tissues. It is divided into primary and secondary forms, according to the absence or presence of previous skin injury.[1,2] The facial miliary osteoma (FMO) is characterized by the presence of multiple osteomas, affecting mainly young middle-aged women, with a previous background of acne.[1,3-5] We report the case of a patient with the human immunodeficiency virus (HIV) with FMO.

CASE REPORT

A 39-years-old female patient, phototype III, presented multiple skin-colored papules on her face, which appeared 3 years ago. The lesions measured 1 to 3mm, had a hard consistency, located in the malar region, glabella and mentum (Figure 1). Clinical laboratory examinations (hemogram, calcium, phosphor, sodium, potassium, urea and creatinine) were normal, HIV sorology was positive. A computer tomography of her face observed small calcifications on the skin surface suggesting bone formation (Figure 2). Light microscopy of a lesion of the glabella revealed a spherical bone formation on the dermis, comprised of osteocytes in oval gaps, laid-out in a laminar manner (Figure 2). Topical treatment with 0.05% retinoic acid in cream was suspended due to intolerance and lack of response, incision and curettage of the bone mate-

Received on 03.08.2010.
Approved by the Advisory Board and accepted for publication on 14.10.2010.
* Work carried out at the Dermatology Service of the Santa Casa de Misericórdia Hospital from Porto Alegre – Porto Alegre (RS), Brazil.
Conflito de interesse: Nenhum / Conflict of interest: None
Suporte financeiro: Nenhum / Financial funding: None

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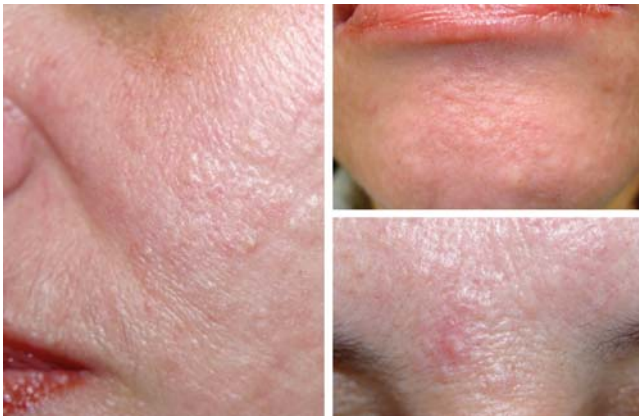

Figure 1: Skin-colored paules in the malar region, mentum and glabella

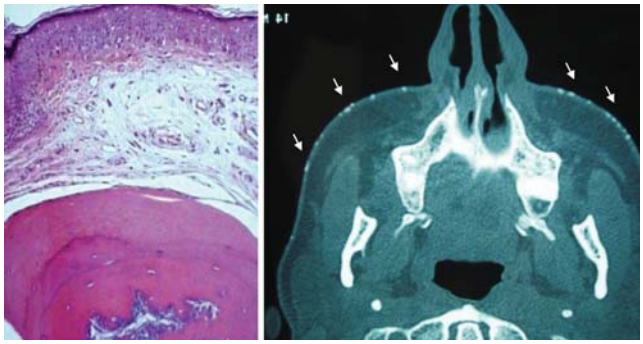

Figure 2: Spherical bone formation in the dermis. Computer tomography with multiple calcifications (arrows) in the skin surface

rial, followed by closure by second intention was performed in some lesions with good results.

DISCUSSION

The FMO was initially described by Hopkins in 1928. [1] It is a rare, benign condition, characterized by the presence of ossification on the dermal and subcutaneous tissue.[4]

The primary ossification is believed to occur when there is no previous tissue injury, it may be associated with syndromes such as: Albright's hereditary osteodystrophy, progressive osseous fibrodysplasia and progressive osseous heteroplasia.[4,5] Secondary ossification, the most common form, occurs on skin areas which were previously affected by inflammatory or infectious processes, such as acne vulgaris, scars and tumors (pilomatrixoma, basal cell carcinoma, desmoplastic malignant melanoma, chondroid syringoma, among others), it may be more rarely associated to chronic inflammatory processes such as dermatomyositis, systemic sclerosis and ossifying myositis.[3,4] Despite the division into primary and secondary osteomas, the causal relationship between the presence of previous inflammation on skin and the onset of miliary osteoma on the face is not fully understood.[1]

The FMO has been reported mainly in fair-skinned middle-aged women, in most cases with a previous background of acne, one previous case was described in the Brazilian literature.[1,3,4,6]

The diagnosis is based on the histopathologic findings and image exams. Light microscoy reveals the presence of bone spicules of various sizes that can be found on the dermis or on the subcutaneous tissue.[7] The bone contains fairly numerous osteocytes (as well as cement lines that may be accentuated in polarized light.). In addition, there are osteoblasts along the surface of the spicules and often osteoclasts in Howships lacunae.The pathogenesis of this condition remains unknown.[2, 4]

Surgical treatment has been described as the most effective therapeutic modality. 8 The use of topical tretinoin presents favorable results in small and superficial lesions.[9] The use of Carbon Dioxide or Erbium: YAG laser with posterior curettage was also described, but it has a higher cost and few cases described in literature. [10,11] ❑

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Como citar este artigo/*How to cite this article*: Camozzato C, Basso FO, Duquia RP, Boff AL, Almeida Jr HL. Facial miliary osteoma in hiv patient. An Bras Dermatol. 2011;86(Supl 1):S66-8.