

Early dermoscopic sign of folliculotropism in patients with mycosis fungoides

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Introduction

Primary cutaneous lymphomas are a diverse group of neoplasms with different clinical presentation, histopathology, and prognosis [1,2]. Dermoscopy is a noninvasive, low-cost method that allows assessment of colors, patterns, and vascular structures, and today we know very well that dermoscopy corresponds well with histopathology. The importance of dermoscopy for the differential diagnosis of pink nodules has already been established and in case of the presence of the pink-yellow structureless areas and polymorphous vessels, the possibility of lymphoma should be taken into consideration [3].

Discussion

The dermoscopic pattern for early patch stage mycosis fungoides (MF) lesions characteristically consists of fine, short,

linear vessels; orange-yellow patchy areas; and spermatozoa-like vascular structures [1]. In a recently published report of a pilot study of primary cutaneous lymphomas, comedo-like openings were observed in folliculotropic MF, likely reflecting follicular plugging and loss of normal hair follicle architecture. The authors describe the dermoscopic perifollicular accentuation presumably reflecting the atypical lymphoid infiltrate within/adjacent to the hair follicle [2]. Patients with the classic clinical and dermoscopic picture of MF do not exhibit follicular changes, and follicles are not usually dermoscopically observed in MF lesions. In dermoscopy, follicles are usually seen if there are some changes in arrangement of melanocytic cells (as in lentigo maligna) or in some diseases in which the follicle is affected (such as discoid lupus, actinic keratosis).

In our patients with patch stage MF (Figure 1a), dermoscopy revealed perifollicular accentuation described as a white halo around the follicles (Figure 2). Folliculotropism

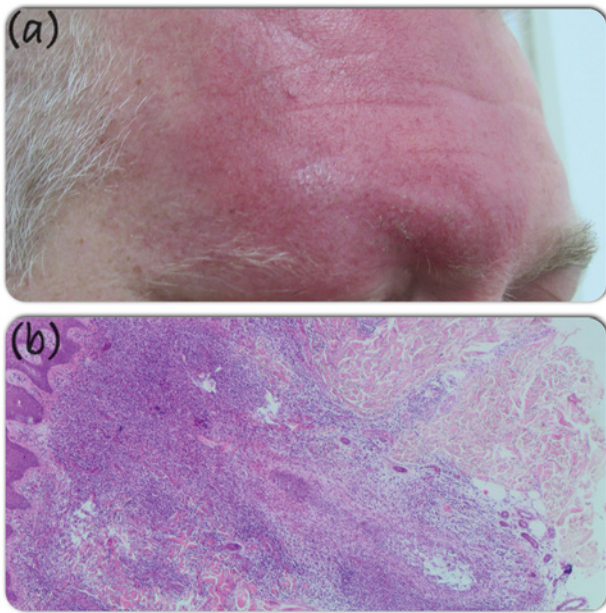


Figure 1. (a) Clinical findings: erythematous patch on the right side of a forehead, with site of biopsy. (b) Histopathological findings: irregular psoriasiform hyperplasia of the epidermis with parakeratosis, heavy lymphocytic infiltrate in the dermis with signs of folliculotropism with some mucin deposits (hematoxylin and eosin, $\times 4$). [Copyright: ©2018 Jurakic Tonic et al.]

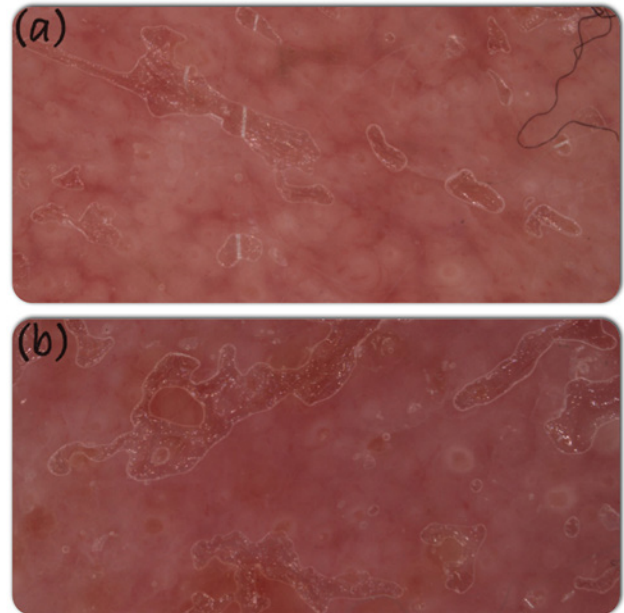


Figure 2. (a,b) Dermoscopic view: perifollicular accentuation seen as a white halo around the follicles. [Copyright: ©2018 Jurakic Tonic et al.]

was confirmed by histopathology (Figure 1b). Perifollicular accentuation made follicles visible (Figure 2). This accentuation depends on the amount of lymphoid infiltrate; therefore, white halos present with different sizes. Perifollicular accentuation can be seen using handheld dermoscopy, but in lesions that do not clinically exhibit criteria for folliculotropism these changes of follicles can be discrete, and we observed that using greater enlargement on the digital dermoscopy device and a nonpolarized camera allows better visualization of the effect on the follicle. Of note, we did not observe accentuation of the follicle in patients with MF without folliculotropism in histopathology. Therefore, we believe this is a very early sign of folliculotropism.

This finding is clinically useful and can be used as a marker for choosing the adequate site of biopsy. Therefore, we suggest using dermoscopy to examine all MF lesions, and especially, if possible, we recommend using greater enlargement of the digital dermoscopic device ($30\times$), as it allows for visualization of more discrete changes in the follicle. This is even more important in light of the clinical observation that patients with folliculotropism may not respond as well as oth-

ers to standard PUVA and re-PUVA treatment, and this group can benefit from additional therapy, such as radiotherapy.

Conclusions

Accentuation of the follicle is an easily recognized dermoscopic sign that can be found in patients who do not exhibit clinical signs of folliculotropic MF. It represents a very early sign that allows us to choose a proper biopsy site, predict histology even at an early stage of MF, select more complex treatment and, finally, to predict the group of MF patients who will have a poor response to the standard treatment

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