To the Editor: A 57-year-old woman presented to our clinic for a pigmented patch on the left foot, which appeared 5 months earlier and progressively enlarged. She felt no pain or any other feelings. Physical examination revealed a light brown patch with an irregular shape and multiple colors, sized 10 mm × 8 mm on the left foot [Figure 1A].

Dermoscopic examination showed a parallel ridge pattern associated with irregular diffuse pigmentation. Multiple colors (light and dark brown, white, black, red), peripheral dots and globules, the regression structures, and surficial anabrosis were also observed [Figure 1B]. Eccrine pores are recognized as whitish dots regularly distributed within the band-like pigmentation.

The lesion was surgically removed and histopathologic analysis revealed the presence of confluent nests of atypical melanocytes with large hyper-chromatic nuclei scattered in the basal layer of the epidermis, and there was no dermal invasion [Figure 1C]. And the immunohistochemical examination showed that human melanoma black-45 (HMB-45) was positive in atypical melanocytes along the basal layer [Figure 1D], but S-100 was not expressed [Figure 1E]. All these findings were consistent with a diagnosis of acral lentiginous melanoma (ALM) in situ.

The challenge associated with early detection of melanoma faced by dermatologists as well as patients is the key strategy for reducing the mortality and economic burden associated with it. The application of dermoscopy has significantly enhanced diagnostic accuracy over naked-eye examination with various diagnostic patterns and algorithms. But the majority of these criteria were established with later-stage invasive melanomas, making identification and diagnosis of melanoma in situ challenging.[1]

ALM is the most common type of cutaneous melanoma in Asians. Dermoscopy appears to be a valuable tool for the early diagnosis of ALM. The most common and specific dermoscopic finding in early (including in situ) ALM is the presence of parallel ridge pattern, which has a specificity of 99%, and a positive predictive value of 84%. The second most common pattern in ALM is the irregular diffuse pigmentation pattern consists of pigmented blotches of various shades of brown, which has a specificity of 96.6%. There are also some other dermoscopic features in ALM, such as the serrated pattern which consists of projections (similar to streaks) at the edge of the tumor and multi-component pattern including abrupt edge, irregular pigmentation, atypical dots and globules, multiple colors, atypical streaks, and so on.[4]

In this case, there are not only parallel ridge pattern, irregular diffuse pigmentation, atypical dots and globules, and regression structures, but the milk-red area and surficial anabrosis which are often found in invasive melanomas. Further studies are needed to complete the dermoscopic features of ALM in situ, especially in Asian.

Declaration of patient consent
The authors certify that they have obtained all appropriate patient consent forms. In the form, the patient has given her consent for her images and other clinical information to be reported in the article. The patient understands that her name and initials will not be published and due efforts will be made to conceal the identity of the patient, although anonymity cannot be guaranteed.

Conflicts of interest
None.

References
1. Nufer KL, Raphael AP, Soyer HP. Dermoscopy and overdiagnosis of melanoma in situ. JAMA Dermatol 2018;154:398–399. doi: 10.1001/jamadermatol.2017.6448.

Correspondence to: Prof. Lin-Lin Xin, Department of Dermatology, Shandong Provincial Qianfoshan Hospital, The First Hospital Affiliated with Shandong First Medical University, Jinan, Shandong 250014, China.
E-Mail: xinll158@sina.com

Copyright © 2019 The Chinese Medical Association, produced by Wolters Kluwer, Inc. under the CC-BY-NC-ND license. This is an open access article distributed under the terms of the Creative Commons Attribution-Non Commercial-No Derivatives License 4.0 (CCBY-NC-ND), where it is permissible to download and share the work provided it is properly cited. The work cannot be changed in any way or used commercially without permission from the journal.

Chinese Medical Journal 2019;132(17)
2. Kwon IH, Lee JH, Cho KH. Acral lentiginous melanoma in situ: a study of nine cases. Am J Dermatopathol 2004;26:285–289.

3. Saida T, Miyazaki A, Oguchi S, Ishihara Y, Yamazaki Y, Murase S, et al. Significance of dermoscopic patterns in detecting malignant melanoma on acral volar skin: results of a multicenter study in Japan. Arch Dermatol 2004;140:1233–1238. doi: 10.1001/archderm.140.10.1233.

4. Marghoob AA, Malvehy J, Braun RP. Atlas of Dermoscopy. 2nd ed. London: Informa Healthcare; 2012:210–219.

How to cite this article: Gao F, Xin LL. Dermoscopic features of acral lentiginous melanoma in situ. Chin Med J 2019;132:2123–2124. doi: 10.1097/CM9.000000000000386

Figure 1: Light brown patch with an irregular shape and multiple colors, which measure 10 mm × 8 mm, on the left foot (A). Dermoscopy reveals a typical parallel ridge pattern (blue arrow), irregular diffuse pigmentation (red arrows), peripheral dots and globules (black arrows), the regression structures (asterisk), milk-red area (yellow arrows), and superficial anabrosis (triangle) (B). Histopathology shows scattered atypical melanocytes in the basal layer of the epidermis (C, hematoxylin and eosin staining, original magnification ×200). Immunohistochemical staining showed HMB-45 positive (D) and S-100 negative (E) (original magnification ×100).