

## Recurrent Acral Lentiginous Melanoma *In Situ* Suggesting the Field Cell Theory

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Dear Editor:

Acral lentiginous melanoma (ALM) is the most common type of cutaneous melanoma in Asians. Traditionally, ALM is believed to have a poor prognosis because of its aggressive behavior and a short radial growth phase, compared with that of lentigo maligna melanoma<sup>1</sup>. We describe a case of recurrent ALM *in situ* around the primary site during 8 years.

A 56-year-old female patient presented with a black macule having an irregular border and color variegation on the left heel, which started 8 years ago (Fig. 1A). Dermoscopic examination showed a parallel ridge pattern and irregular pigmentation. She had undergone excisional biopsy (3-mm margin), which revealed only a few scattered atypical melanocytes along the basal layer. She had returned after 2 years (Fig. 1B) and then after 4 years (Fig. 1C) because of newly appearing brown patches around the first location. Serial punch biopsies revealed mild melanocytic hyperplasia without marked cytologic atypia again. The results made a pathologist hesitant to diagnose ALM *in situ* instead of "atypical melanocytic proliferation." At that time, the patient didn't want additional surgery; we recommended regular follow-up considering the possibility of atypical melanocytic prolifera-

tion. Most recently, she presented with further enlarged, multiple pigmented patches (Fig. 1D). She was treated with wide excision (1-cm margin) and split-thickness skin graft under the consideration of malignant melanoma. Bland lentiginous proliferation of atypical melanocytes confined to the epidermis prompted the final diagnosis of ALM *in situ* (Fig. 1E). Immunohistochemically, atypical melanocytes were stained positively for Melan-A, HMB-45, and anti-S-100 (Fig. 1F).

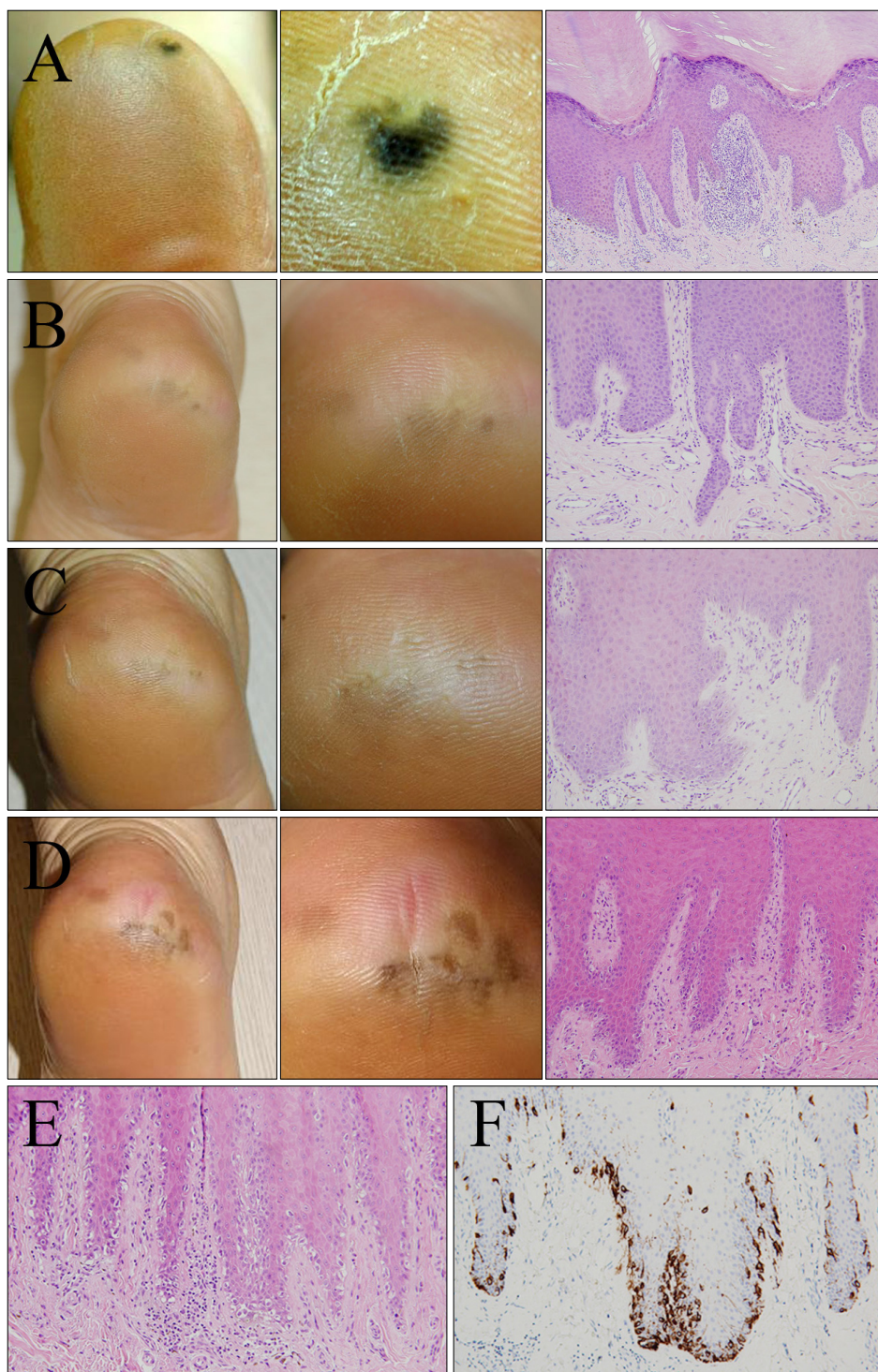
ALM was believed to have an aggressive biological behavior. However, in Asians, the specific population was reported inconsistent with the classical concept. After Nogita et al.<sup>2</sup> described atypical melanosis of the foot, acral melanocytic lesions have been described with histopathologically subtle melanocytic proliferation, despite clinically malignant melanoma<sup>3</sup>. These lesions did not show invasive behavior over a decade; though some of them reappeared around the primary site even after the surgical excision. There has been debate about the nature of these lesions; however, they are now considered as the precursor of ALM that fulfills both the clinical and dermoscopic criteria<sup>4</sup>.

The most notable feature of our case was the recurrent melanocytic lesions appearing around the primary site in the absence of invasion during 8 years. Takata et al.<sup>5</sup> suggested that acral and mucosal melanomas could originate from field melanocytes detected in normal-looking skin extending over the obvious lesion. These field cells harbor mutations of the *KIT* gene and amplifications of *cyclin D1* or *cyclin-dependent kinase 4* gene. Although our case initially showed only bland melanocytic proliferation without marked atypia or invasion, local melanoma could reappear from the residual field cells. Therefore, we recommend that the clinician should consider these lesions as ALM *in situ* and

Received September 2, 2013, Revised November 20, 2013, Accepted for publication December 11, 2013

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**Fig. 1.** Acral lentiginous melanoma *in situ*. Clinical and histopathological feature. (A) Initial presentation 8 years ago. (B) Second presentation 6 years ago. (C) Third presentation 4 years ago. (D) Last presentation. Left, gross picture of the lesion; center, close-up picture of the lesion showing multiple dark brown to black pigmented enlarged patches with irregular border and variegated color on the left heel; right, histopathologic feature demonstrating bland proliferation of scattered melanocytes without marked atypia or dermal invasion (A~D: H&E,  $\times 200$ ). (E) Lentiginous hyperplasia of melanocytes was prominent only in the epidermis (H&E,  $\times 200$ ). (F) Melan-A staining showed atypical melanocytes confined to the epidermis (immunoperoxidase,  $\times 200$ ).

treat with early complete excision. Also, it is better to perform an excisional biopsy for a review of the entire lesion in the suspicious acral melanocytic lesions. Finally, regular follow-up for several years is important for the detection of reappearing melanoma around the primary site, even after the surgical excision.

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<http://dx.doi.org/10.5021/ad.2014.26.6.781>

## Foreign Body Reaction due to a Retained Cuff from a Central Venous Catheter

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Dear Editor:

Foreign body reaction is a tissue response to extraneous materials such as injected materials or implanted medical devices<sup>1</sup>. Here, we report a unique foreign body reaction caused by a retained cuff from a central venous catheter.

A 63-year-old male patient with a history of end-stage renal disease presented with an asymptomatic, firm mass on the right chest for several months. One year ago, because of swelling and tenderness on the continuous ambulatory peritoneal dialysis (CAPD) catheter site, his CAPD catheter was removed, and a hemodialysis (HD) catheter was inserted through the right internal jugular vein. The CAPD catheter was reinserted after 2 weeks, and the HD catheter was removed by manual traction after 2 months. The patient visited our clinic with a 2 cm, skin-colored, subcutaneous mass on the right chest (Fig. 1). On incisional biopsy, there was an odorous, pus-like drainage and pieces of foreign material (Fig. 1). Histological examination showed groups of fibers with adjacent

granulation tissue (Fig. 2). He was referred to the Department of General Surgery, and the catheter remains were completely removed. He had no complications.

Venous access catheters are used for treatments such as HD and chemotherapy. Many catheters have polyester cuffs at the end for anchorage to the subcutaneous tissue. The catheters can be removed by traction or with a cutdown procedure<sup>2,3</sup>. When catheters are removed by traction, parts of the cuffs can break off and be retained in the subcutaneous tissue in 10% ~ 50% of cases<sup>2</sup>. The reported complications of retained cuffs include infection, abscess, discharge, and delayed healing<sup>2,3</sup>. Our patient had an odorous, pus-like drainage; however, we did not perform bacterial culture or Gram stain. Antibiotics were given, and the wound site healed without complications. Retained cuffs are clinically insignificant unless infection occurs<sup>2,4</sup>. In a study by Kohli et al.<sup>3</sup>, 428 cuffed central venous catheters were removed by traction, and catheter cuffs were retained in only 41 (10%) of the patients. Of

Received September 30, 2013, Revised January 4, 2014, Accepted for publication February 1, 2014

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