Granulomatous pigmented purpuric dermatosis

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DESCRIPTION

A 61-year-old Caucasian female patient presented with erythematous–violaceous purpuric macules and punctiform papules, involving the dorsum of the feet and the legs, evolving for 1 month. The lesions were mildly pruritic and non-blanchable (figure 1). Her medical history includes hyperlipidaemia, high blood pressure, varicose veins and type 2 diabetes. No new medications were given in the past 11 months.

We performed a cutaneous biopsy on the right leg that revealed atrophy of the epidermis, vasodilation in the superficial dermis and a non-necrotising granulomatous infiltrate consisting of relatively well-circumscribed granulomas with a peripheral lymphocytic crown. The infiltrate was associated with marked haemosiderin deposition in the adjacent dermis, confirmed by Perls stain (figure 2), but no vasculitis features were observed. These findings are consistent with granulomatous pigmented purpuric dermatoses (PPDs). Treatment with topical corticosteroids during 2 months and emollients during 1 year resulted in moderate improvement.

Granulomatous PPD is a rare subtype of PPD that is typically seen in women of Far East Asian descent on the distal lower extremities and feet.^{1–3} Saito and Matsuoka reported granulomatous PPD for the first time in 1996.⁴ The condition is usually distinguished from other types of PPDs by the detection of a granulomatous infiltrate on histopathology in addition to the other features of PPD.^{1 3 4} This variant has been associated with hyperlipidaemia, although this association is unclear and requires further investigation.² Other frequent findings described are arterial hypertension and diabetes mellitus.^{2 5} The differential diagnosis of PPDs includes cutaneous vasculitis,

Figure 2 Non-necrotising granulomatous infiltrate in the superficial and middle dermis with a predominantly perivascular distribution (H&E 25×), Perls stain showing haemosiderin deposition (100×).

stasis dermatitis, traumatic purpura and mycosis fungoides.¹ Treatment is not always necessary and is generally considered for patients with associated symptoms or because the cosmetic appearance of the skin lesions.²

Learning points

- ▶ Granulomatous pigmented purpuric dermatosis (PPD) is a rare subtype of PPD distinguished by the detection of a granulomatous infiltrate on histopathology in addition to the other features of PPD.
- ▶ Granulomatous PPD is a benign condition that does not typically require treatment.

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Figure 1 Erythematous–violaceous purpuric macules and punctiform papules, non-blanchable, located in the anterolateral aspect of the legs and the dorsum of the feet, more exuberant to the right side.

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