

Psoriasiform Pustular Eruptions from Pegylated-liposomal Doxorubicin in AIDS-related Kaposi's Sarcoma

Sir,

Liposome-encapsulated doxorubicin (DOX-SL) is highly effective and relatively safe for the treatment of AIDS-related Kaposi's sarcoma (KS). Myelosuppression, nausea and diarrhoea comprise the most frequent systemic side-effects of DOX-SL (1, 2). We report herein for the first time the case of a 34-year-old Caucasian man who developed extensive psoriasiform pustular eruptions during treatment with DOX-SL.

CASE REPORT

A 34-year-old HIV-positive man presented with histopathologically proven KS. The patient had no history of psoriasis, allergy or photosensitivity. Laboratory examinations revealed CD4⁺ lymphocytes 67/ μ l, a CD4/CD8 ratio of 0.1 and a viral load of 65,400 copies/ml consistent with CDC C3. We started antiretroviral therapy (ART) with a combination of Zidovudin/Lamivudin (Combivir®) and saquinavir (Fortovase®), which resulted in a decrease in viral load to <40 copies/ μ l. Nevertheless, ART could not stop progression of KS. Three months after initiating ART we started chemotherapy with DOX-SL (45 mg/m²). After four cycles of DOX-SL, the patient presented with itchy, scaly, erythematous papules, pustules and plaques on the knees, elbows, dorsal aspect of the hands and feet and inner thighs (Figs. 1 and 2). Histological examination revealed superficial perivascular dermatitis with lymphohistiocytic and eosinophilic infiltrates. A patch test showed delayed hypersensitivity to DOX-SL after 48 and 72 h. Patch testing of five controls was negative. Local treatment with fluocortolone produced temporary benefit. During the 5th and 6th cycle of chemotherapy with DOX-SL, KS almost completely disappeared; however, psoriasiform eruptions persisted. Within the next 4 weeks after finishing DOX-SL, the skin eruptions had completely cleared. On starting a second course of chemotherapy with DOX-SL, we observed a relapse of the patient's skin rash. Within 3 months after completely finishing therapy with DOX-SL, all psoriasiform eruptions had cleared with intermittent topical corticoid therapy.



Fig. 1. Scaly, erythematous plaques on the knees and two Kaposi's sarcomas on the left shin bone.



Fig. 2. Scaly and pustular eruption on the dorsal aspect of the hands.

DISCUSSION

Apart from palmo-plantar erythrodysesthesia, which occurs in approximately 17.5% of patients, other dermatological effects of DOX-SL, i.e. alopecia, pruritus and urticaria, have only rarely been reported (3, 4). Our patient's skin rashes were concluded to be due to DOX-SL: firstly, because the lesions were initiated by starting therapy with DOX-SL, as all other drugs had already been administered periodically without dermatological side-effects; secondly, because the eruptions completely disappeared after interrupting therapy; and finally, because eruptions were provoked again after restarting therapy with DOX-SL and a patch test for DOX-SL was positive. Although the skin lesions clinically resembled psoriasis, our patient had no psoriatic diathesis and histologic examination showed no evidence of psoriasis. On the contrary, the micromorphologic features were consistent with a drug rash. The positive patch test raised the possibility of an allergic mechanism. Thus, the spectrum of cutaneous side-effects of DOX-SL needs to be broadened.

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