

## Recurrent Papulopustular Scalp Lesions

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A healthy 5 month old male infant was brought to our pediatric department for a five-day evolving pruriginous scalp rash. Physical examination revealed scalp papulopustular lesions, with an erythematous base, and some honey-colored crusts (Fig. 1) as well as cutaneous erythematous macular lesions on the trunk (Fig. 2). Treatment with oral flucloxacillin for 10 days was carried out, which showed clinical improvement. The parents reported a milder similar episode two months earlier with spontaneous resolution. Laboratory blood tests showed peripheral eosinophilia with no other pathological findings. Swabs of the pustules were negative for herpes simplex virus 1 and 2 (polymerase chain reaction method), but bacterial culture was positive for methicillin sensitive *Staphylococcus aureus*. A second course of oral flucloxacillin and topic mupirocin was prescribed but recurrent episodes of scalp lesions persisted. At the age of 8 months, a biopsy of papulopustular lesions on the scalp was performed. The histopathological examination showed the presence of perivascular eosinophils, no fungal or Langerhans cells were found, and so the findings were suggestive of eosinophilic pustular folliculitis of infancy. In subsequent breakouts of the disease, our patient was treated with topic fusidic acid and betamethasone valerate. Currently, the patient is 2 years old and is asymptomatic in the last five months.

Eosinophilic pustular folliculitis of infancy is an idiopathic disease that presents with recurrent crops of pruritic, follicular pustules on the scalp.<sup>1,2</sup> About 65% of patients have lesions on other body parts.<sup>3</sup> The timing of the presentation ranges from birth to 1.5 years.<sup>2</sup> Usually it presents as sterile papulopustules but a secondary infection with *Staphylococcus aureus* might occur. The diagnosis is based on clinical features, course, and demonstration of eosinophils in pustule content or skin biopsy.<sup>4</sup> The differential diagnosis includes erythema toxicum neonatorum, infantile acropustulosis, herpes simplex virus infection, impetigo, Langerhans cell histiocytosis, among others.<sup>3</sup> Eosinophilic pustular

folliculitis of infancy has good prognosis, with resolution around the age of 3 years in 80% of cases.<sup>2</sup>



**Figure 1.** Papulopustular lesions on the scalp with an erythematous base



**Figure 2.** Cutaneous erythematous macular lesions on the trunk, some with central papulopustular lesions

**Keywords:** Infant; Eosinophilic Pustular Folliculitis; Scalp Dermatoses; Skin Diseases, Vesicubullous/diagnosis; Skin Diseases, Vesicubullous/drug therapy

### WHAT THIS REPORT ADDS

- Eosinophilic pustular folliculitis of infancy must be considered in the differential diagnosis of recurrent papulopustular scalp lesions.
- Eosinophilic pustular folliculitis of infancy is an idiopathic disease that presents with recurrent crops of pruritic, follicular pustules on the scalp and in 65% of cases in other body parts.
- The timing of first presentation ranges from birth to 1.5 years and 70% presents before the age of 6 months.
- Biopsy of the lesions is essential to establish definitive diagnosis.
- Eosinophilic pustular folliculitis of infancy has a good prognosis with spontaneous resolution around the age of 3 years in 80% of cases.

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### Confidentiality of data

The authors declare that they have followed the protocols of their work centre on the publication of patient data.

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