# analesdepediatría

www.analesdepediatria.org

#### IMAGES IN PAEDIATRICS

# Lymphoproliferative disorder under the appearance of mask-related folliculitis



## Trastorno linfoproliferativo bajo apariencia de foliculitis por mascarilla

Álvaro Vázquez-Pérez<sup>a,\*</sup>, David López-Delgado<sup>b</sup>, Francisco Fernández-Segovia<sup>c</sup>, Jesús Tercedor-Sánchez<sup>b</sup>, Juan Luis Santos-Pérez<sup>a</sup>

- a Servicio de Pediatría, Hospital Universitario Materno Infantil Virgen de las Nieves, Granada, Spain
- <sup>b</sup> Servicio de Dermatología, Hospital Universitario Virgen de las Nieves, Granada, Spain

Received 1 February 2022; accepted 12 April 2022 Available online 13 March 2023

A patient aged 8 years sought care for a lesion in the right cheek with onset 4 months prior and no history of insect bite. The followup by the paediatrician was carried out by telephone on account of the restrictions to in-person care placed during the COVID-19 pandemic. Initially, the suspected diagnosis was folliculitis associated with mask use, for which the neologism *maskne* has been coined.

Successive treatment with topical antibiotics (clindamycin and mupirocin) and an oral antibiotic (cefadroxil) achieved no improvement, and the lesion continued to grow. The patient presented with a plaque measuring about  $3\times3$  cm in the malar region, elastic and eroded on the surface (Fig. 1). A polymerase chain reaction test for detection of *Leishmania* on skin scrapings was negative. Examination of a biopsy specimen led to histological diagnosis of cutaneous CD4+ small/medium T-cell lymphoproliferative disorder (CSMLPD) (Fig. 2). The patient received topical



Figure 1 Plaque measuring about  $3 \times 3 \, \text{cm}$  in the malar region.

*E-mail address*: alvaro.vazquez.sspa@juntadeandalucia.es (Á. Vázquez-Pérez).

c Servicio de Anatomía Patológica, Hospital Universitario Clínico San Cecilio, Granada, Spain

DOI of original article: https://doi.org/10.1016/j.anpedi. 2022.04.009

<sup>\*</sup> Corresponding author.

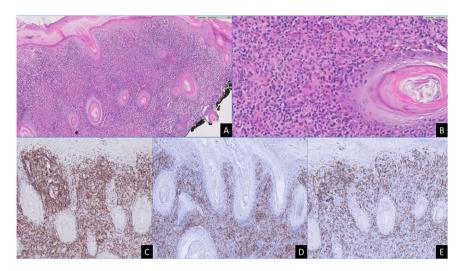


Figure 2 Histology of cutaneous CD4+ small/medium T-cell lymphoproliferative disorder. (A) Dense lymphocytic infiltrate in the superficial and deep dermis (haematoxylin and eosin stain [H&E]  $\times$  100). (B) At higher magnification, lymphocytes showing moderate atypia in the perifollicular zone (H&E  $\times$  400). The lymphoid infiltrate was positive for CD3 (C) and CD4 (D) markers, accompanied by a minority of CD8 cells (E) (C-E:  $\times$  400).



**Figure 3** Hyperpigmented macule with milia on the surface without evidence of infiltration on palpation.

treatment with clobetasol propionate, with improvement of the lesion at 1 month of treatment (Fig. 3).

Cutaneous CD4+ small/medium T-cell lymphoproliferative disorder is a primary cutaneous lymphoma provisionally classified as a proliferative disorder to emphasize its benign course and discourage aggressive systemic treatment. The differential diagnosis includes other cutaneous T and B cell lymphomas, reactive lymphoproliferative disorders, pseudolymphoma and lupus erythematosus tumidus. Treatment options include surgery, topical or intralesional steroids and phototherapy.

The prolonged use of masks during the COVID-19 pandemic has been associated with the development and worsening of facial dermatoses.<sup>3</sup> Their increased prevalence and the widespread use of the term *maskne* may obscure and result in underdiagnosis of other, more complex<sup>3</sup> or infrequent disorders. An appropriate differential diagnosis must be carried out, as not everything is *maskne*.

### References

- Surmanowicz P, Doherty S, Sivanand A, Parvinnejad N, Deschenes J, Schneider M, et al. The clinical spectrum of primary cutaneous CD4+ small/medium-sized pleomorphic T-cell lymphoproliferative disorder: an updated systematic literature review and case series. Dermatology. 2021;237(4):618–28, http://dx.doi.org/10.1159/000511473.
- Ponce S, Peñate Y, Montenegro T. Trastorno linfoproliferativo primario de células T pleomórficas pequeñas/medianas CD4+ coincidente en dos hermanas. Actas Dermosifiliogr. 2020;111(3):271-3, http://dx.doi.org/10.1016/j.ad.2018.09.020.
- Rudd E, Walsh S. Mask related acne ("maskne") and other facial dermatoses. BMJ. 2021:n1304, http://dx.doi.org/10.1136/bmj.n1304. Published online June 7.