

# Lipschütz's ulcers in an adolescent with SARS-CoV2 infection

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## Abstract

Lipschütz's ulcers (LU) are rare entities, which occur mostly in non-sexually active young women. UL appear to be associated with infectious conditions such as Epstein-Barr virus or cytomegalovirus. We report a case that revealed that SARS-CoV-2 infection could be considered a trigger event for the appearance of acute vulvar ulceration.

## TITLE: Lipschütz's ulcers in an adolescent with SARS-CoV2 infection

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## KEY CLINICAL MESSAGE

A possible association between Lipschütz's ulcers (LU) and SARS-CoV-2 infection had emerged. After excluding other more common causes, this new infectious association should be considered when approaching vulvar ulcers.

## KEYWORDS

Vulvar ulceration, Sars-Cov-2, Gynecology, Dermatology, Pediatrics

## CASE DESCRIPTION

We report a healthy 17 year old adolescent who noted flu-like symptoms and the appearance of painful vulvar lesions associated with pruritus and dysuria.

Physical examination revealed multiple, painful ulcers located on the medial side of both *labia minora* (Figure 1).

A nasopharyngeal swab test was positive for SARS-CoV-2. PCR assay was negative for Herpes Simplex virus. Tests for *Chlamydia trachomatis* and *Neisseria gonorrhoeae* were negative. Urinalysis revealed no evidence of infection. Serologic tests were negative for EBV, CMV, syphilis, HIV and *Mycoplasma pneumoniae*. International Criteria for Behçet's Disease were applied and this disease was excluded. The patient was treated with oral anti-inflammatory drugs and topical lidocaine. 2 weeks later she was asymptomatic and with complete resolution of the vulvar ulceration.

After all investigation, SARS-CoV-2 infection was considered the trigger event for the appearance of the acute vulvar ulcers.

LU are rare entities characterized by a sudden onset of necrotic and painful genital ulcers, which occur mostly in non-sexually active young women. The mechanism responsible for this lesions is still unknown, but it is thought that it is associated with an underlying infectious disease. EBV is noted to be the most cited infectious etiology.<sup>[1,2]</sup>

A final diagnosis of LU related to SARS-CoV-2 is only possible after excluding other causes for these type of vulvar pathology.<sup>[2]</sup> With the emergence of the pandemic, a new infectious etiology should be considered when approaching vulvar ulcers. Clinical cases like this alert to possible associated conditions to SARS-CoV-2 infection, leading us to know this new coronavirus better and better.

#### *Informed Consent*

Written informed consent was obtained from the patient to publish this report in accordance with the journal's patient consent policy

#### *Conflict of Interest*

No conflict of interest was declared by the authors.

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#### *Authorship*

All authors made substantial contribution to the preparation of this manuscript and approved the final version for submission.

**MLM** : acquired the image, got the patient's consent, did the literature search and wrote the main aspects of the manuscript.

**MM and AM** : revised the manuscript, corrected English language and added some critically important intellectual content.

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