

# WHAT IS YOUR DIAGNOSIS

## DERMATOLOGY CLINICAL CASE

### CASO CLÍNICO DERMATOLÓGICO

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A previously healthy 15-year-old girl resident in France, on vacation in Portugal, was referred to the Pediatric Emergency Department by the general practitioner for suspicion of hematological disease. She presented ecchymotic lesions of sudden overnight onset on the anterior region of the thorax and antero-proximal region of the upper limbs, which had apparently worsened in the last 24 hours. The girl had been permanently accompanied by her mother at home during the previous days, as well as during medical assessment. She denied trauma or impact sports, fever or recent infections, blood loss or other symptoms, or any chronic medication. There was no personal or family history of hemorrhagic disorders. On admission, the girl presented multiple linear purpuric streaks on exposed areas, with symmetrical distribution, in the upper third of the trunk and antero-proximal region of the arms (**Figure 1**). No other dermatological or pathological findings were evident on physical examination. Laboratory evaluation, including complete blood count, biochemistry, prothrombin time with international normalized ratio, and activated partial thromboplastin time were all normal and urine toxicology screening was negative. The analytical study with no relevant results prompted a new clinical approach. During medical assessment according to the acronym SSHADESS (Strengths, School, Home, Activities, Drugs/substance use, Emotions/eating, Sexuality, Safety), the girl reported a troublesome relationship with her parents and denied history of substance abuse or sleep disturbances, as well as previous deliberate self-harm behavior or other risk factors.<sup>1</sup>

**What is your diagnosis?**



**Figure 1** - Striking linear symmetric purpuric streaks in the upper third of the trunk and proximal extensor sides of both arms. Purpura was not palpable

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## DIAGNOSIS

Intentional self-inflicted injuries

## DISCUSSION

The presence of purpura in adolescents may be an irrelevant finding related to trauma or a sign of a life-threatening condition. Therefore, it is of particular concern to physicians due to several possible and potentially severe consequences. Trauma is a common cause of purpura in adolescents; however, lesion location may raise suspicion of other diagnoses. Presence of purpura on the face, upper arms, or soft tissue areas may suggest intentional trauma.<sup>2</sup>

Adolescence is an important period for emotional and behavioral challenges associated with central nervous system maturation. It is currently acknowledged that some behaviors, as impulsiveness, have an organic basis. When experiencing strong negative emotions, adolescents develop a range of coping behaviors, some of which may be maladaptive, such as substance abuse, disordered eating patterns, and non-suicidal self-injury (NSSI).<sup>3-5</sup> NSSI involves intentional self-inflicted injuries without suicidal intent. Most of the times this behavior goes unnoticed, including by parents, and episodes rarely result in hospital admission. NSSI usually presents during early-to-mid adolescence, as a way of coping with intense negative emotional states.<sup>3,4,6</sup>

Although studies show that psychosocial stress may influence patient's propensity for NSSI, clinical manifestations are not necessarily associated with severe psychological disturbances and may be triggered by factors as boredom.<sup>2</sup> The present clinical case is one such example: the girl tried to worry her mother by mimicking an organic disease with the purpose of obtaining secondary benefits. Lesion location – limited to exposed areas – and symmetry, combined with a negative analytical study, led to suspicion of NSSI. This case illustrates a diagnostic challenge and alerts for self-inflicted lesions among adolescents once suspicion has been raised. Early recognition of this behavior is important to develop timely preventive strategies and draw attention of healthcare professionals to its signs and symptoms. Patients presenting such lesions require a coherent multidisciplinary approach and good communication between involved caregivers.

## CASE TREATMENT AND CLINICAL OUTCOME

Faced with negative test results during the interview, the adolescent revealed that she was upset and confessed intentional self-inflicted injuries after her mother took her phone following a discussion. Parents were made aware of the situation and a pediatric psychiatry consultation was recommended. Upon discharge, follow-up in the girl's country of origin was assured.

## CONCLUSIONS

With this clinical case, the authors intend to raise awareness of the importance of maintaining a high index of suspicion to identify NSSI. This was particularly relevant in this case of a teenager with purpuric lesions located in exposed areas without other signs or symptoms and with normal laboratory evaluation.

Factitious purpura is a peculiar clinical entity. An incoherent history is typically present, in which lesions suddenly occur without the patient recognizing any preceding signs or symptoms.<sup>2</sup> It is a diagnosis of exclusion and should be considered once all other purpura causes have been reasonably discarded.

Although propensity for NSSI substantially declines with age, in some patients it can develop into chronic behavior, extending into late adolescence and adulthood. Consequently, adolescence is a key developmental stage for prevention and intervention.<sup>3,4</sup>

## ABSTRACT

A previously healthy 15-year-old girl was sent to the Pediatric Emergency Department by the general practitioner due to suspicion of a hematological condition. The girl presented with ecchymotic lesions on the anterior region of the thorax and antero-proximal region of the upper limbs, which had apparently worsened in the last 24 hours. She denied trauma or impact sports, fever or recent infections, and blood loss or other symptoms. Laboratory evaluation showed no alterations and urine toxicology screening was negative. When confronted with normal laboratory evaluation, the girl confessed intentional self-inflicted injuries following a discussion with her mother. Parents were made aware of the situation, and a pediatric psychiatry consultation was recommended. After discharge, follow-up in the girl's home country was assured.

With this report, the author intend to raise awareness of the importance of maintaining a high index of suspicion to non-suicidal self-injury, identifying alarm signs and establishing early preventive strategies.

**Keywords:** adolescence; self-inflicted injuries; early intervention; purpura

## RESUMO

Uma adolescente de 15 anos, previamente saudável, foi referenciada ao Serviço de Urgência Pediátrica por suspeita de doença hematológica. Apresentava equimoses na região anterior do tórax e antero-proximal dos braços, com agravamento aparente nas últimas 24 horas. Negava história de traumatismo, febre, infecções, perdas hemáticas ou outra sintomatologia. O resultado do estudo analítico foi negativo, bem como o estudo urinário de abuso de

drogas. Quando confrontada com a avaliação analítica negativa, a adolescente confessou autoagressão após discussão com a mãe. A importância da avaliação em consulta de pedopsiquiatria foi explicada aos pais e o seu seguimento no país de origem assegurado.

Com este caso, os autores pretendem alertar para a importância do reconhecimento precoce de comportamentos autolesivos, identificando sinais de alarme e instituindo estratégias de prevenção atempadamente.

**Palavras-chave:** adolescência; comportamentos autolesivos; intervenção precoce; púrpura

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Received for publication: 24.12.2018

Accepted in revised form: 16.04.2019

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