



Case Report

What Strange Spots!

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KEYWORDS

*Dark macules,
Ash-gray macules,
Ashy dermatosis,
Dermatosis cinerea*

ABSTRACT

The author presents the case of a 13-year-old boy who had been exhibiting asymptomatic, grayish-brown macules on both upper and lower limbs for approximately one month. The key clinical, dermoscopic, and histopathological findings support an accurate differential diagnosis among conditions with similar presentations.

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Introduction

A 13-year-old boy presented to the clinic for his annual health check-up. For about one month, he has exhibited asymptomatic dark macules on both upper and lower limbs, without fever, signs of inflammation, or itching.

The trunk, palms, soles, face, and mucous membranes are unaffected. The patient is not taking any medi-

cations and has no history of previous dermatological conditions.

The lesions are symmetrically distributed on both the upper limbs (Fig. 1) and lower limbs (Fig. 2).



Fig. 1. Gray macules on the upper limbs.



Fig. 2. Gray macules on the lower limbs.

The main and most frequent conditions to consider in the differential diagnosis are:

- Pityriasis rotunda
- Terra firma-forme dermatosis

- Acanthosis nigricans
- Pityriasis rosea of Gibert
- Pityriasis versicolor
- Ashy dermatosis

Discussion

Pityriasis rotunda

This is a genetically transmitted condition, typically observed in the Sardinian population. It is a benign disorder characterized by oval or round, hypopigmented

lesions that tend to resolve spontaneously after puberty. It can be considered a genodermatosis, likely related to geographic isolation.

Terra firma-forme dermatosis

This is a form of hyperkeratosis that resembles dirty skin, presenting as 'dark patches' on the neck, trunk, and limbs. It is not removed by regular cleansing with

soap and water but can be effectively removed using a cotton swab soaked in alcohol or nail polish remover (acetone).

Acanthosis nigricans

Acanthosis nigricans is a cutaneous condition typically found in individuals with obesity and type 2 diabetes mellitus, associated with insulin resistance. It is characterized by dark, hyperpigmented, almost velvety

plaques due to epidermal hypertrophy. The most commonly affected areas are the neck and axillae. Dermoscopy reveals a papillomatous surface with accentuated skin furrows forming polygonal patterns.

Pityriasis rosea of Gibert

This is a skin condition that begins with a single “herald patch,” followed by the appearance of multiple oval-shaped lesions, predominantly on the trunk. Under dermoscopy, a well-defined collarette of scale (epider-

molytic border) can be observed. The lesions are pink rather than ash-gray in color and, in the classic form, follow a characteristic “Christmas tree” distribution on the trunk.

Pityriasis versicolor

This is a common fungal infection, often occurring in summer and autumn. It presents with multiple roundish patches of variable color and is sometimes associated

with pruritus. Under Wood’s lamp examination, *Pityrosporum* fluoresces with a characteristic yellow-green hue.

Ashy dermatosis (dermatosis cinerea)

Ashy dermatosis is characterized by asymptomatic ash-gray macules symmetrically distributed on the limbs, trunk, neck, and face. Unilateral presentation and

mucosal involvement have also been described.

Diagnosis

Ashy dermatosis

Ashy dermatosis, also known as dermatosis cinerea, is characterized by asymptomatic ash-gray macules symmetrically distributed on the limbs, trunk, neck, and face (1). Unilateral forms and mucosal involvement have also been reported (2). It most frequently affects individuals in the second decade of life. The etiology is unknown, although it is often associated with previous infections, drug intake, or genetic factors (3).

of the lesions, the symmetrical distribution over the affected areas, the sparing of the palms, soles, scalp, and mucous membranes, and the absence of symptoms or associated conditions.

On dermoscopic examination (Fig. 3), melanin granules can be observed in the deeper dermis, which visually imparts a bluish-gray color to the affected areas (4).

The most striking features are the grayish coloration



Fig. 3. Dermoscopic examination shows the presence of fine granules with a gray hue.

Histological examination is sometimes performed solely to exclude other conditions, as findings are non-specific. It reveals basal layer cells containing numerous melanin-filled vacuoles, the presence of melanophages in the dermis, and a leukocytic infiltrate at the basal layer.

Ashy dermatosis, or dermatosis cinerea, does not pose any health risk to the patient. It is primarily an aesthetic issue, but it can have psychological consequences and

social implications.

In some cases, it may be appropriate to attempt therapeutic intervention, although there is no standardized treatment strategy that consistently resolves the condition.

Some therapeutic benefit has been reported with clofazimine, topical tacrolimus, oral dapsone, phototherapy, oral isotretinoin and antioxidants (Vitamin C and Vitamin E).

Conclusion

Ashy dermatosis is a rare condition among Caucasian individuals. It is more commonly observed in patients with Fitzpatrick skin phototypes III-V, i.e., those with darker skin tones.

The patient in our clinical case represents an uncom-

mon occurrence, but in the context of an increasingly multiethnic society, we are likely to encounter this condition more frequently. Early recognition is important due to its potential social impact and the resulting negative effect on patients' quality of life.

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