



#DaVinciCases

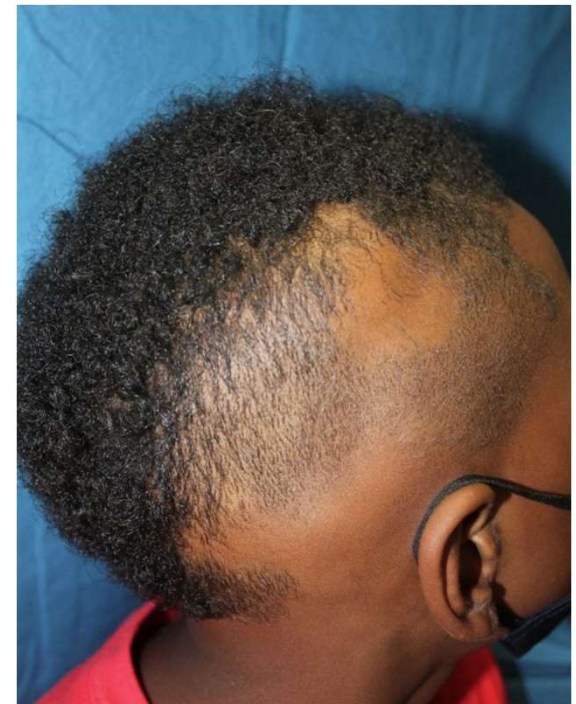
[Dermatology Case 5](#)



Dermatology 5

A 9-year-old male presents to the clinic with sudden hair loss. His mother reports noticing the patchy hair loss 1 week ago after taking her son to the barber. The child denies any accompanied scalp pain or itch. The child has no significant past medical history however, his mother has a history of hypothyroidism. Vital signs are within normal limits. Physical exam reveals 3-4 well-circumscribed areas of hair loss on the parietal and temporal scalp (shown below). There are no signs of inflammation, erythema, or scarring. Short broken hairs that narrow at the base are seen at the margins of the patches. There is no associated lymphadenopathy. **What is the most likely diagnosis?**

- A. Tinea Capitis
- B. Alopecia areata
- C. Trichotillomania
- D. Traction Alopecia
- E. Telogen effluvium



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Key Findings

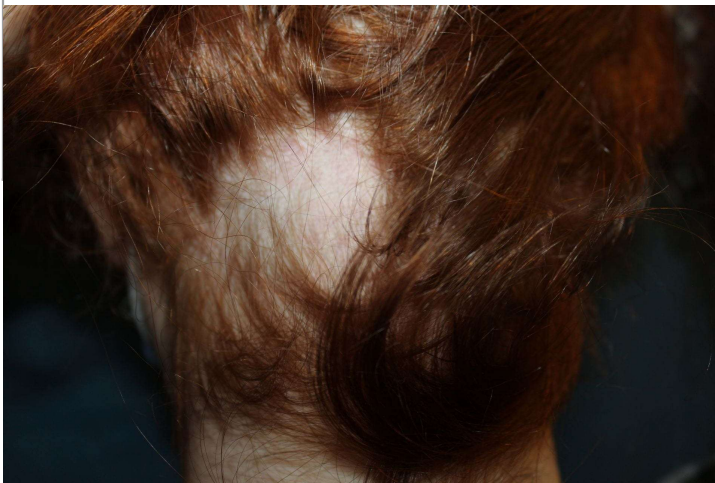
- Sudden hair loss (not gradual)
- Asymptomatic (no itch or pain)
- Family history of autoimmune disease (mother with hypothyroidism)
- Physical Exam: Patchy discrete areas of hair loss without signs of inflammation; signs of “exclamation point hairs”
- Differential:
 - Alopecia areata
 - Telogen effluvium
 - Tinea capitis



Dermatology 5

Alopecia Areata

- Chronic, autoimmune non-scarring hair loss disorder that is a common cause of focal and sudden hair loss in children and adults
- Associated with other autoimmune diseases (esp. thyroid and atopic disorders)
- Physical exam: smooth, discrete circular patches of hair loss that are typically asymptomatic; may see exclamation point hairs that are extracted easily



Dermatology 5

Telogen Effluvium

Non-scarring alopecia characterized by temporary but sudden diffuse hair shedding

- Typically triggered by metabolic stress, hormonal changes, or medications
- Positive hair pull test



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Telogen effluvium regrowth

Tinea Capitis

Superficial fungal infection of the scalp is typically caused by dermatophytes (trichophyton rubrum and Microsporum)

- Symptoms: hair loss and pruritis
- Physical Exam: single or multiple scaly patches on the scalp with small black dots from broken-off hairs and cervical lymphadenopathy



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Tinea capitis

Images source: DermNet NZ



Dermatology 5

Other causes of hair loss in pediatric and adult populations:

Trichotillomania

Hair loss secondary to recurrent, repetitive, and intentional pulling of the hair

- Associated with OCD, OCPD, mood disorders, and BPD
- Physical exam: hair growth in several stages (different lengths)
- Cognitive behavioral therapy is the first line therapy



Traction Alopecia

Hair loss due to repetitive tension of the hair

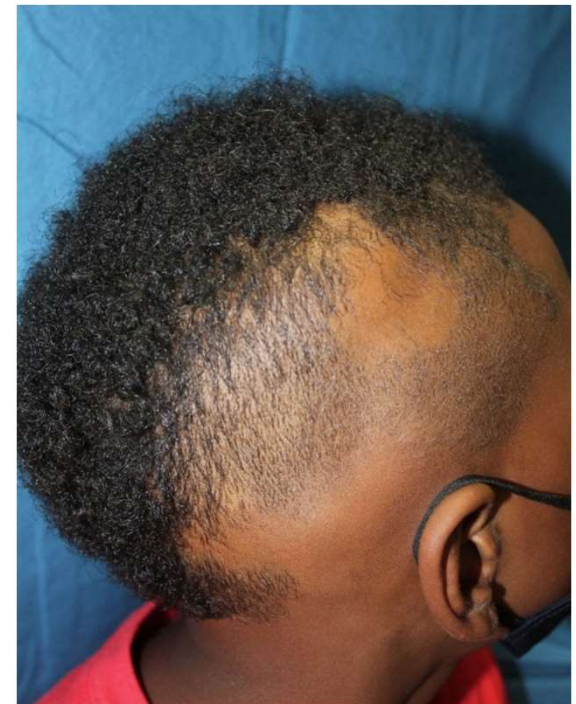
- common occurrence in Afro-Caribbean hairstyles
- hair loss usually along the marginal hairline (frontal, temporal, or occipital) with decreased retained follicular markings and the presence of a “fringe” of finer, or miniaturized hairs



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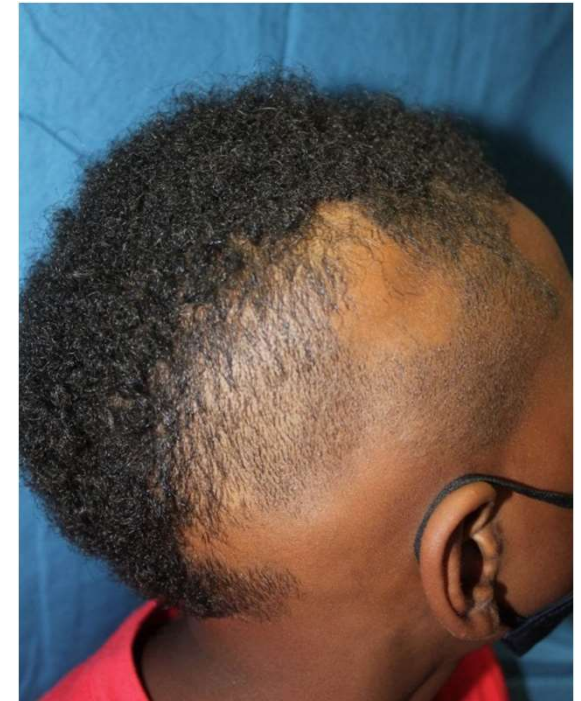
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- A. Tinea Capitis → single or multiple scaly patches on the scalp with small black dots from broken-off hairs and cervical lymphadenopathy
- B. Alopecia areata** → smooth, discrete circular patches of hair loss that are typically asymptomatic
- C. Trichotillomania → hair growth in several stages (different lengths)
- D. Traction Alopecia → hair loss usually along the marginal hairline
- E. Telogen effluvium → temporary but sudden diffuse hair shedding after stressor



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Website for images used in this presentation:
UAB Digital Dermatology Atlas
<https://sites.uab.edu/dermatologyatlas/>





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