An Asymptomatic Erythematous Plaque on the Chin of a 45-year-old Woman

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CASE REPORT

A 45-year-old woman had asymptomatic skin lesions for several months. She was healthy except for a history of hyperthyroidism 10 years previously treated with thyroidectomy. She then became hypothyroid and had been maintained on thyroxine replacement. She had no congenital anomalies and her family history was non-contributory. Physical examination revealed a slightly erythematous, non-tender plaque on the chin (Fig. 1). She had areas of induration and non-pitting edema on her shins and upper back. The results of blood tests, including thyroxine and thyroid stimulating hormone, were within normal limits.

Myxedema was suspected, and a 4-mm punch biopsy specimen was obtained from the chin lesion. Histologically, the dermis contained randomly oriented, mature, striated muscle fibers with admixed mesenchymal elements including adipose tissue, vessels, and collagen (Fig. 2), findings consistent with a diagnosis of RMH. The patient was offered CO2 resurfacing or excision, but she declined since the plaque was benign and cosmetically inconspicuous.

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DIAGNOSIS: Plaque Like Rhabdomyomatous Mesenchymal Hamartoma

DISCUSSION

RHM, also known as striated muscle hamartoma, hamartoma of cutaneous adnexa and mesenchyme, or congenital midline hamartoma, was first described in 1986,1-3 with 34 cases reported to date.1,9 It is most often congenital but can be discovered during adulthood either as a persistent lesion since birth or as an acquired anomaly. The most common presentation is as an asymptomatic pedunculated nodule, like a skin tag, around the eyes, nose, or mouth.

Only two of the previously reported 34 cases of RHM presented as plaques. One was that of a 10-year-old girl with an asymptomatic, yellowish, ill-defined plaque for 4 years on her chin4 and the other of a 40-year-old woman with an asymptomatic plaque on her chin for 10 years.5 Both patients’ medical histories were unremarkable, and there was no similar family history.

Histologically, RMH is characterized by a normal epidermis overlying a dermis that contains haphazardly oriented striated muscle fibers intermingling with varying amounts of mesenchymal elements, including adipose tissue, blood vessels, collagen, and elastic fibers. The differential diagnosis includes neoplastic or hamartomatous tumors containing similar components. Cutaneous rhabdomyoma, Triton tumors, and accessory tragus may have skeletal muscle fibers. Rhabdomyoma has embryonic skeletal muscle rather than mature skeletal muscle fibers.6 Triton tumor, also known as neuromuscular hamartoma, consists of subcutaneous nodules of skeletal muscle with intimately admixed neural elements.6 Accessory tragus usually has elastic cartilage with only a few fragments of skeletal muscle near the base. Nevus lipomatosus superficialis, fibrous hamartoma of infancy, infantile myofibromatosis, and fibroepithelial polyp may have similar clinical and histological features but contain no skeletal muscle.5

Congenital RHM has been attributed to disordered development of second branchial arch-derived superficially located striated muscle, such as the orbicularis oris, platysma, and orbicularis oculi. The skeletal muscle fibers apparently migrate aberrantly into the dermis during embryogenesis.7 Therefore, RHM is sometimes associated with other congenital abnormalities, such as Delleman’s (oculocerebrocutaneous) syndrome.8 Case reports include a neonate with cleft lip and palate, amniotic bands, and syndactyl upper extremity digits,1 a neonate with bilateral leukocoria from sclerocornea, low-set ears and preauricular sinus,6 a 3.5-month-old infant with a thyroglossal duct sinus,4 and a 6-month-old infant with coloboma, corneal leukoma, microphthalmia, and a limbal dermoid.1

In summary, we report one additional case of RMH, with a distinctive presentation as a plaque. Although RMH is a benign lesion, it is wise to consider the possibility of ocular or central nervous system anomalies when the condition is congenital.

REFERENCES