Granuloma Faciale: A Diagnostic Challenge

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BACKGROUND

Granuloma faciale is a benign and chronic inflammatory dermatosis.[1]

It presents with red or brown papules or plaques.[1]

The most common site affected is the face, although extra facial involvement can occur.[2] Pain is not usually a feature.[1,2,3]

Males are affected more than females.[2]

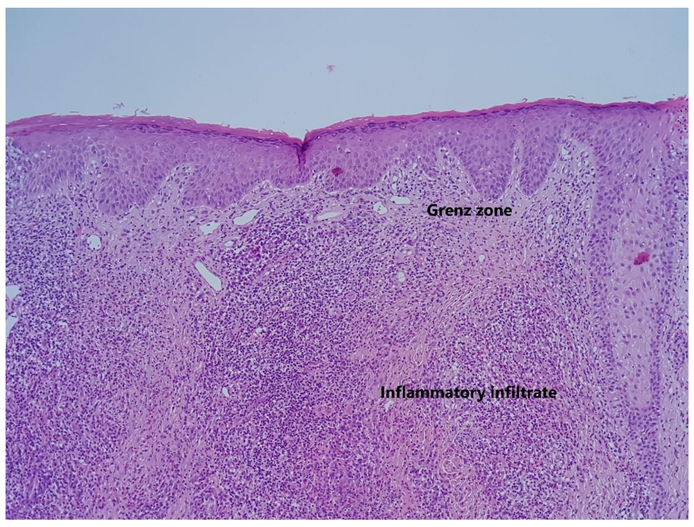
Caucasian patients are more likely to be affected.[3]

Diagnosis is based on a combination of clinical and histological features.

It can be difficult to distinguish from malignancy or chronic lymphadenitis.

HISTOLOGICAL FEATURES

- Mixed dermal inflammatory infiltrate: neutrophils, eosinophils, lymphocytes, histiocytes, and plasma cells.[2]
- Grenz zone: A thin zone of uninvolved papillary dermis separating the epidermis from the inflammatory infiltrate.[2]
- Perivascular inflammatory infiltrates penetrating vessel walls.[2]
- Dermal Fibrosis: concentric fibrosis around blood vessels.
- The term "granuloma faciale" is a misnomer, as granuloma formation is not a histologic feature of this disorder.[2]



Excisional biopsy of patient WC demonstrating a Grenz zone and inflammatory infiltrate.
Image provided by Southern Community Labs.

CASE

WC is an 80-year-old Pākehā man who presented with multiple submandibular nodules. These were non-tender and initially thought to represent reactive lymph nodes.

Over the following two years, he developed multiple cutaneous and subcutaneous nodules on the facial, submental and submandibular regions. He was trialled on a course of oral doxycycline without improvement.

INVESTIGATION

The initial fine needle aspirate was non-diagnostic, as was a subsequent punch biopsy.

Excisional biopsy suggested reactive lymphoid infiltrate.

A further excisional biopsy of the lesion demonstrated the characteristic **Grenz zone** and significant nodular inflammatory infiltrate, allowing the diagnosis of granuloma faciale to be made.

MANAGEMENT

Lesions do not typically resolve spontaneously.

Lesions tend to relapse and remit over several years.

Treatment aims to reduce the appearance of the lesions.

Options for initial therapy include:

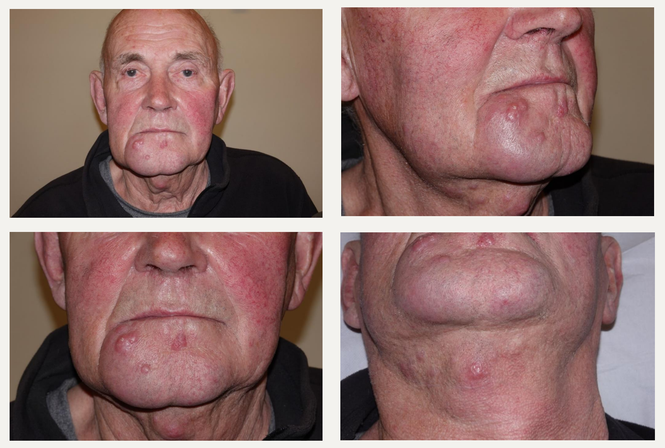
- Cryotherapy
- Topical or intralesional corticosteroids
- Topical tacrolimus
- Pulsed dye laser
- Dapsone

Topical tacrolimus: This is the preferred treatment as cryotherapy potentially has a more significant side effect profile.

Topical tacrolimus 0.1% ointment is applied twice daily to the affected area. Improvement is expected within the first three months.

Unfortunately, this treatment is not covered by PHARMAC in New Zealand, resulting in out-of-pocket expenses for patients.

Prior to treatment



Post intralesional steroid and topical tacrolimus

CASE MANAGEMENT

In order to avoid expense for the patient, a single intralesional corticosteroid injection of Triamcinolone Acetonide (Kenacort A-40) was given, with minimal response.

This was then escalated to topical tacrolimus, with significant improvement.

The lesions reduced in size and reduced erythema, and the patient was very pleased with the result.

LEARNING POINTS

- Granuloma faciale can present a diagnostic challenge both clinically and histologically.
- Repeat biopsy may be required to confirm the diagnosis.
- Once a diagnosis is made, several treatment options are available.
- Topical tacrolimus can be effective but is not funded.

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