

CASE REPORT

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Management of oral lichenoid reaction associated with anti-tubercular therapy: A rare case report

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ABSTRACT:

Abstract: Oral lichen planus is a chronic inflammatory condition of the oral mucosa. Lichenoid reaction refers to lesions which mimic the clinical picture of lichen planus but occur due to reaction to certain medications, dental materials, food items, flavoring agents etc. This case report describes a rare case of lichenoid reaction to anti tubercular therapy. The patient was treated using pulse therapy consisting of a combination of 50 mg Levamisole and 5 mg Prednisolone along with topical application of 0.1% Triamcinolone acetate. He responded well to the therapy and showed gradual improvement.

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Introduction

Oral lichen planus affects 1-2 per cent of the general adult population and is the most common non-infectious oral mucosal disease in patients referred to oral medicine and oral pathology clinics [1]. Oral lichen planus affects women more than men (1.4:1). This disease occurs predominantly in adults over 40, although younger adults and children may be affected. Lesions are typically bilateral and often appear as a mixture of clinical subtypes.

The terms oral lichenoid reactions (OLRs) or oral lichenoid lesions (OLLs) refer to lesions histologically and clinically similar to oral lichen planus (OLP), though with the particularity that in these cases the underlying cause is identifiable [2]. Drug-induced oral lichenoid reactions were first mentioned in 1929, and

were later cited in 1971 by Almeyda and Levantine [3]. Oral mucosal lichenoid lesions may follow the administration of a systemic drug, with a variable lag period. These lichenoid drug reactions (LDR) may be unilateral but usually appear as idiopathic OLP.

Drugs that have been implicated in oral LDR include non-steroidal anti-inflammatory drugs, angiotensin-converting enzyme inhibitors and beta-blockers, although there are many others [4]. Oral mucosal lichenoid lesions may follow the placement of a dental restoration or provision of a denture. These lichenoid reactions are usually the result of a contact sensitivity or irritant contact response to an amalgam or composite resin dental restoration or a denture component in close proximity to the oral mucosa. Toothpaste flavorings, especially cinnamates, may also trigger lichenoid contact sensitivity reactions.

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The case discussed here is a case of lichenoid reaction associated with anti tubercular therapy. The aims of therapy were to eliminate mucosal erythema and ulceration, alleviate symptoms and prevent malignant transformation.

Case Report: A 42 year old civilian male reported with the chief complaint of burning sensation in the mouth and lips associated with discoloration of lips since 3 months. He had intolerance to spicy food and was concerned that he was suffering from cancer. He was diagnosed with tubercular lymphadenitis 6 months back and was put on antitubercular therapy (Ethambutol, Rifampicin, Isoniazid, Pyrazinamide for initial 2 months followed by Isoniazid & Rifampicin for 7 months). He first became aware of the inability to eat spicy food 3 months back, which gradually increased to complete intolerance. Gradually, he developed burning sensation of the whole mouth and the discoloration of the lips. Clinical examination revealed a black pigmentation of lower lip with a central erythematous zone and a white striated zone interposed between the outer and inner zones. The lesion covered the lower lip completely except the angle of the mouth on both the sides (Fig 1). Intraoral examination revealed a bilateral involvement of buccal mucosa with lesions showing a central erythematous zone interspersed with white striae and pigmentation. The lesion on left buccal mucosa extended from the angle of the mouth anteriorly to the retromolar area posteriorly. The lesion also extended superiorly to maxillary molar area. The right buccal mucosa had a lesion extending from retromolar area to the first molar area (Fig 2)

The patient was counseled. He was put on a pulse therapy using a combination of 50mg Levamisole with 5mg Prednisolone (5 pulses). A topical application of 0.1% Triamcinolone acetate 3-4 times /daily was advised. He was also advised and monitored for plaque control. A histopathological analysis was planned in case the patient did not respond to the therapy. However since he came back

for review only after 3 months and the lesions had regressed significantly by then, it was decided not to carry out the biopsy. The anti tubercular therapy was stopped by the treating physician after 3 months. The patient responded well to the treatment. At the review 3 months after pulse therapy was stopped, the clinical picture had improved and the patient was comfortable (Fig 3,4). Based on the observation that the lesions started reducing after discontinuing the ATT, it can be confirmed that this was a case of lichenoid reaction to the anti-tubercular drug therapy.

Discussion:

Oral lichen planus (OLP) is a chronic inflammatory condition that is probably of multifactorial origin, often idiopathic with an immunopathogenesis involving T-cells. Oral lesions that are caused by contact with dental materials are called oral lichenoid contact lesions (OLCL) while those which are induced by drugs are designated as oral lichenoid drug reactions (OLDR). Oral lichenoid lesions are almost indistinguishable from OLP, both clinically and histologically. Histologic appearances of idiopathic lichen planus and lichenoid drug eruptions are very similar. The World Health Organization (WHO) criteria for OLP do not differentiate between the two conditions [5]

Corticosteroids have been used as a therapeutic modality for LP topically, intralesionally or systemically [6,7]. Even though daily oral steroid therapy is highly effective, long-term use may result in serious side effects. To avoid these side effects, pulse therapy was conceived. Dexamethasone-cyclophosphamide pulse therapy in pemphigus patients has been widely accepted [8]. Oral mini-pulse therapy may be used for longer periods with minimal side effects as compared to daily corticosteroid therapy. Even if a relapse occurs, the therapy may be repeated and remission may be achieved in a large proportion of cases. Topical corticosteroids are widely used in the treatment of vesiculo-erosive diseases of

the oral mucosa including OLP to reduce pain and inflammation. Patients with OLP may benefit from both topical pimecrolimus and triamcinolone acetonide therapy with minimal side effects [9].

There cannot be a uniform approach to the treatment and management of OLP or lichenoid reaction because it varies from individual to individual. Control of oral hygiene is the most important consideration during management of OLP and can enhance healing of the lesions. Appropriate management of OLP will help to control pain and significantly improve the quality of life for many patients.

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Figure 1- The lesion on lower lip



Figure 2- The lesions on right and left buccal mucosa



Figure 3- Post treatment 3 months lower lip lesion regressing



Figure 4- Post treatment 3 months buccal lesions healing