INTRODUCTION

Chronic paronychia (CP) is an inflammatory disorder of the proximal nail fold (PNF). It is one of the most common specific nail complaints met within dermatological practice. It ranks in importance with fungal infection and psoriasis as a cause of nail disease, but present more commonly and is often misdiagnosed and mistreated ***(dé Berker et al., 2004)***.

The majority of patients are between 30-60 years of age, although CP can be also seen in children as a results of thumb sucking ***(Stone and Mullins, 1968).***

The diagnosis of CP is established on the following criteria, absence of the cuticle associated with swelling and erythema of the PNF with or without nail plate surface abnormalities ***(Tosti et al., 2002).***

Nail plate irregularities such as irregular transverse ridges result from disturbed adjacent matrix by the inflammatory process. Nail plate discoloration is probably due to pigment from pseudomonas infection of the nail ***(Samman, 1982).***

Acute exacerbations occur from time to time due to secondary bacterial infection by Staphylococcus aureus or albus or chemicals under the PNF ***(Barlow et al., 1970)***.

Although Candida is very commonly isolated from PNF of patients with CP ***(Barlow et al., 1970)***, the involvement of Candida in the onset and maintenance of the disease has never been proven ***(Tosti et al., 2002)***

and there is controversy about the role of Candida in CP *(Daniel et al., 1998)*.

Piraccini, (2003), suggested that the first step in the development of CP is always a mechanical or chemical trauma that leads to cuticle damage. When the cuticle is damaged, the epidermal barrier of the PNF is destroyed and the PNF is suddenly exposed to variety of environmental hazards. Irritants and allergens easily penetrate to PNF and produce inflammatory reaction which interfere with normal nail growth and the formation of new cuticle. Microorganisms further promote chronic inflammation of the PNF.

Daniel et al., (1996) studied the factors that played a role in the pathogenesis of CP. The culture results indicated that Candida commonly grew from the PNF scrapings and significant contact irritant was frequently found by history taking.

Food hypersensitivity may be responsible for the disease in food handlers *(Tosti et al., 1992)*, and CP from latex hypersensitivity has been reported *(Kanerva, 2000)*.

Accumulating evidence indicates that CP is not a mycotic disease, but a variety of hand dermatitis influenced by environmental exposure to water, irritants and foods in food handlers. Like hand dermatitis, CP is frequently a multifactorial disease and different types of pathogenesis may operate together *(Tosti et al., 2002)*.

Optimal management of CP includes protective measures to avoid allergen or irritant exposure *(Tosti et al., 2002)* hand care, medications

(dé Berker et al., 2004) and surgery intervention in recalcitrant cases *(Hochman, 1995)*. Treatment of secondary bacterial infections with antibacterial solution, ointments, or oral antibiotics may be necessary *(Rochwell, 2001)*.