



NAIL DISORDERS

## EFFICACY OF A PROTECTIVE NAIL PRODUCT COMPOSED BY VITAMIN E AND ESSENTIAL OILS OF LIME, OREGANO AND TEA TREE FOR TREATMENT OF NAIL ONYCHOMYCOSIS.

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**Introduction:** Onychomycosis is a fungal nail infection, frequently caused by dermatophytes. As reported in literature the essential oils have an important antimicrobial and antifungal action.

**Objective:** The present study was set up to evaluate the efficacy and safety of a protective nail product composed by Vitamin E and essential oils of lime, oregano and tea tree, for topical treatment of mild-to-moderate onychomycosis.

**Materials and Methods:** Twenty five adults of both sexes with a mild-to-moderate onychomycosis (max two toe nails involved), applied daily the protective nail product for 6 months. Clinical efficacy was evaluated through OSI (Onychomycosis Severity Index) score at baseline and days 90 and 180, respectively. All patients underwent microbiological testing (at baseline and study end). Complete response was defined as 0% clinical involvement of the target nail and mycological cure (negative KOH examination and fungal culture).

**Results:** Patients were 16 female and 9 male subjects, median age was 57. Preliminary results at 90 days show a decrease in OSI score of over 75% (OSI75) in 20% of the patient. Other evaluated parameters as dystrophy, discolouration, and thickening, respectively improved. The treatment were well tolerated and appreciated for their properties and efficacy.

**Conclusions:** These preliminary data show that daily application of protective nail oil composed by Vitamin E and essential oils can be a safe and effective option for the topical management of onychomycosis especially in patients in which oral antifungal drugs are contraindicated.

