DERMOSCOPY AND SKIN IMAGING

# MONITORING OF THE EFFICACY OF A PRODUCT BASED ON TOCOTRIENOLS IN THE THERAPY OF PHOTODAMAGE SKIN

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The increase of the incidence of skin tumors (melanoma and non-melanoma skin-cancer) follows the prolonged and widespread photoexposure of the cutaneous actinic damage. This evidence has made it essential to develop non-invasive diagnostic methods that allow an early diagnosis and assessment of the alterations that characterize the photodamaged skin and precancerous lesions. In the literature it has been shown that vitamin E, composed of tocopherols and tocotrienols, has protective effects on the skin, anti-oxidant action, blocking free radicals, depigmenting action, anti-tumor, anti-aging action. Topical application of nano-emulsions of tocotrienols is effective in inhibiting the proliferation of cutaneous carcinoma cells, protect skin against skin damage induced by UVB and have a cytotoxic action on melanoma cells. The aim of the study is to verify the efficacy of the use of topical products containing antioxidant active agents on the reduction of UV damage: by photoanging, lipo-oxidative damages, inflammatory phenomena and collagen oxidation by means of non-invasive diagnostic methods.
It is a prospective observational study, whose primary purpose is to evaluate the efficacy of tocotrienols in skin photodamage through a clinical and instrumental evaluation with non-invasive diagnostic methods. The clinical response will be compared with the microscopic changes detected through in vivo confocal microscopy (RCM), a relatively new method that represents a "link" between dermoscopy and histopathology, with which it is possible to obtain a non-invasive microscopic characterization of the lesion with cellular resolution.
The study involves the enrollment of 45 adult patients with mild-moderate to severe actinic damage in the presence or absence of actinic keratoses of the face as indicated and according to guidelines.
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