

EPADILIN®: Increases Skin Hydration and Improves Skin Surface Profile

Authors

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Background

EPADILIN® is a unique, high purity cream containing optimally balanced, omega 3 (eicosapentaenoic acid - EPA) and omega 6 (gamma linolenic acid - GLA) fatty acids. EPADILIN® has a novel dual action approach to anti-aging by hydrating the skin and reducing skin roughness. The EPA component of EPADILIN® is photoprotective against the effects of ultraviolet light (UVA and UVB) and the GLA component combats inflammation and oxidative stress in the skin.

Objective

To investigate the efficacy of EPADILIN® in improving skin hydration out and skin surface profile.

Methods

In a single centre, randomized, placebo-controlled, explorative study, 14 subjects were enrolled to receive EPADILIN® applied twice daily for two weeks on a 5 x 5 cm² area on the volar forearms following repeated suberythematous UV irradiation with a sun simulator that emits UVA and UVB. The study was double blinded for test products and open for control areas. Efficacy was assessed by measuring skin hydration assessed by skin electrical capacitance using a corneometer and skin roughness as a measure of skin surface profile.

Results

EPADILIN® significantly prevented dehydration of the skin compared to untreated areas when applied twice daily over a period of two weeks with repeated sub-erythematous irradiation. Treatment with EPADILIN® resulted in a 24% increase of skin hydration compared to a 10% decrease in untreated subjects ($p < 0.001$), after two weeks of treatment. EPADILIN® produced an 8% decrease in skin roughness of the finer skin structures ($p = 0.048$, from baseline), and produced a smoothening of rougher skin structures.

EPADILIN® was well tolerated with no adverse reactions reported during the conduct of the study.

Conclusion

EPADILIN® demonstrated clinical improvements in skin surface profile and skin hydration, offering a new safe and effective product to protect against skin damage and aging, and to treat dry skin.