Superficial Chemical Peels as a Tool for Skin Rejuvenation

Chemical peels are important for skin rejuvenation. Their popularity is related to their versatility and relative simplicity. Chemical peels are classified as superficial, medium, and deep according to the depth of penetration of the peeling solution. The results of the procedure depend on the chemical used and its concentration, skin preparation, method of application, contact time and skin condition. The depth of the peel determines the magnitude of the results, but also the patient's inconvenience during and after the procedure, the healing time and the rate of potential side effects [1].

How Do Superficial Chemical Peels Work

The use of chemicals for facial rejuvenation has been explored since ancient times. A sound knowledge of skin anatomy and wound healing is important for understanding the principles of chemical peeling [2]. Superficial peels, only penetrating to various levels of the epidermis, help to improve skin radiance and luminosity and can be used to enhance treatment of a variety of conditions including acne, melasma, photodamage and post-inflammatory hyperpigmentation.

Superficial chemical peels decrease the pH at the surface of the skin and change the pH gradient of the stratum corneum. This alters the corneodesmosomes (connections between dead skin cells), which reduces cell cohesion between the stratum corneum and the stratum granulosum. Meanwhile, the pH change can also impair intercellular enzymes that are responsible for maintaining intercellular lipids and regulating desquamation. The result is exfoliation and epidermal regeneration leading to an improvement in skin texture and tone. The exfoliative effect of chemical peels also stimulates collagen with more evenly distributed melanin [3].

The depth of the peel is correlated with clinical changes, with the greatest change achieved using deep peels. However, the depth is also associated with longer healing times and the potential for greater complications. Superficial peels, described as dynamic tools, [4] are safe and tolerated with mild discomfort, such as transient burning, irritation, and erythema [5]. Patients need to have realistic expectations and understand that achieving optimal benefits from peels requires repeat procedures. [6].

The Importance of Post Treatment Care

Home care products prepare your skin for chemical peels and then maintain the results post treatment. Patient participation and education is required, emphasising the importance of sun protection and the use of an appropriate skin care regimen, which includes cleansing, exfoliation and moisturizing. Topical retinoid maintenance therapy can also help maintain the skin rejuvenation results achieved with a chemical peel [8]. The patient should be warned about the possible lack of desired effects if the peels are not repeated often enough and not accompanied by daily topical treatment [9]. AlumierMD provides a variety of superficial depth peels that treat skin conditions and concerns including rosacea, acne, hyperpigmentation, photodamage, wrinkles & fine lines.

Most beneficial ingredients for the skin tend to degrade or denature when placed in the low pH of chemical peel formulas. With that scientific information in mind, AlumierMD peels use only the pure acids; antioxidants, anti-aging and brightening booster ingredients are applied post-peel in our Brightening Accelerator so all components remain effective.

Peels remove the outer dead layers of the stratum corneum, so the booster ingredients are better absorbed when applied post-peel. AlumierMD's multilayer process can be customized by your skin care professional according to your skin profile and concerns.

AlumierMD provides a post treatment kit containing the most effective ingredients to restore barrier function and hydration while protecting skin from UVA and UVB. Broad spectrum sunscreens contain only physical filters, therefore, mitigating the potentially harmful effects of chemical UV filters.

Post Treatment Kit

Sensicalm Cleanser

Key ingredients: ceramides, aloe, allantoin, niacinamide, tocopherol acetate, yucca root extract, sunflower seed oil

Recovery Balm

Key Ingredients: hinokitiol, copper peptide, sea whip

Sheer Hydration Broad Spectrum Sunscreen SPF40+

Key Ingredients: micronised zinc oxide, titanium dioxide, magnesium ascorbyl phosphate, tocopherol acetate, reseveratrol, grape seed extract, glutathione

References:

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