

Arcillas (Clays)



For years, clay minerals have been used as excipients in many pharmaceutical preparations or in the cosmetic industry given their beneficial effects on health.

Differences between clays

In general, in nature, it is possible to find clays of different colors (red, green, yellow, purple, blue, white), depending on the presence of iron and its chemical state. For example, if it is divalent iron, the clays have a green color. On the other hand, if it is trivalent iron, the color turns red, and when the clay is white it does not contain iron (1).

They can be used in creams, powders, emulsions or masks for topical use. It has the ability to beautify, modify the physical appearance and / or preserve the physical-chemical conditions of the skin. It is also used in hair shampoos due to its detoxifying effect.

Antibacterial effect

Multiple studies have proven the antibacterial ability of illite-rich clay. For example, in this study comparing the reduction of *S. aureus* bacteria in an untreated wound and one treated with clay for 7 days, clearly significant differences were observed (figure 1). The study concludes that there is a decrease in the bacterial load, the inflammatory response and the macroscopic morphology of the wound (3).

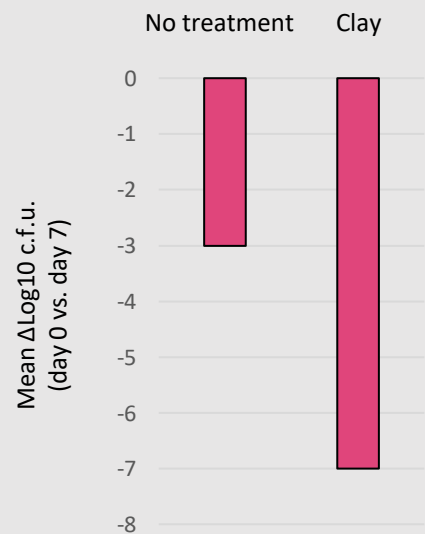


Fig. 1 Reduction of bacterial colonies in 7 days with and without clay application (3).

Red clay

Red clay has absorption capacity, and it facilitates the absorption of secretions from the skin or toxins produced by environmental pollution. Its absorption capacity is weaker compared to other clays. Therefore, it is indicated for dry and sensitive skin, in order not to dry out the skin even more. In addition, it is also found in products such as sunscreens with low SPF values as one of the UV filters that compose it, due to its illite content (2). At the same time, it can provide a color light brown or reddish brown and can also be used as a pigment for different cosmetics. Moreover, it has an antibacterial and anti-inflammatory effect (3).



Green clay

Green clay is for greasy, shiny or dull hair. It is also recommended for people with oily, combination or prone skin, as it removes dirt from the skin and scalp, in addition to absorbing excess of sebum. Its absorption capacity is higher than that of red clay.

- Regulates sebum production
- Fight acne
- Reduces the appearance of blackheads and tightens pores.
- Mattifies the skin
- Helps the skin heal
- Fight dandruff
- Purifies and balances the scalp



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