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TOPIC(s) : Biomass conversion

Sphingomonas xenophaga : From thermal spring ferment to biological activity

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PURPOSE OF THE ABSTRACT

Context : The specificity of the mineral compositions from thermal waters has been demonstrated by their dermatological and cosmetic virtues. Our desire was to revisit these properties by isolating part of the endogenous microbial flora from the thermal spring water of La Roche Posay.

Challenge : Based on the know-how acquired from the development of the first thermal strain of Vitreoscilla filiformis combined with the active performance of La Roche Posay thermal water, L'Oréal R&I isolated a new set of strains from the endogenous flora component of this water. A strain of Sphingomonas xenophaga that is likely to meet our needs has been selected. An industrial fermentation process guarantees the production of robust, reproducible biomass with proven biological effectiveness.

Scientific proposal : This biomass preserves the barrier function(1,2) by strengthening tight junctions and modulates the skin's immune response. These properties make it a captive performance asset. This Sphingomonas ferment extract or Sphingobioma combined with neurosensine are the 2 main active ingredients of the new Tolériane range from La Roche Posay, which was launched in October 2021.

FIGURES

FIGURE 1

FIGURE 2

KEYWORDS

Microbiome | Barrier fonction

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