# Unitamuron H-22

A natural active polysaccharide with outstanding moisturizing properties

Skin dehydration is caused by external aggressions, that lead to visible signs of aging. Unitamuron H-22 is the vegetal equivalent of hyaluronic acid, and acts at two levels to counteract these phenomena:

- 1) A velvet film is formed on skin
  - > Skin is more hydrated, day after day;
- 2) The skin looks younger
  - > Skin elasticity is increased while the roughness is decreased.



## Focus on the product

### Skin is mainly composed of water

Our skin, like the rest of our body, is composed largely of water. Poor diet, external aggressions, or too low water consumption cause the skin to become thirsty! Dehydrated, it loses its flexibility and suppleness. This phenomenon is amplified with aging, which leads to a weak barrier function and so to an increasing level of water-loss and therefore a greater need for water.

## Unitamuron H-22: your moisturizing natural film...

Unitamuron H-22, thanks to its film-forming and moisture-regulating polysaccharides, extracted from tamarind seeds, is able to promote a high level of hydration to recover the youthfulness of the skin:

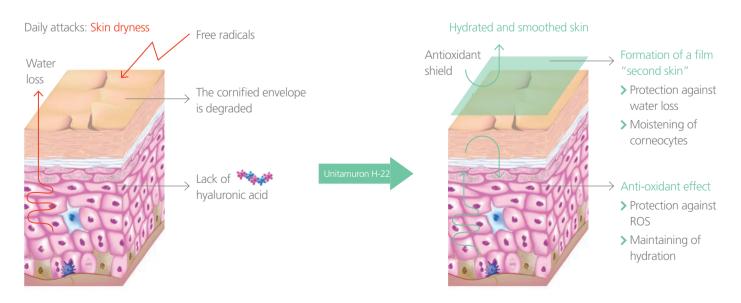
- > Tamarind seed extract contains polysaccharides that are able to form hydrocolloidic films at the surface of the skin to help recover a good level of hydration. This extract is also known to contain a high level of antioxidants<sup>1</sup> and has an anti-hyaluronidase<sup>2</sup> effect to even better control the moisture content of the skin.
- > Pentylene glycol is known for its moisturizing properties and is used here as a carrier system to enhance the outstanding properties of the tamarind seed extract, and acts as a supplement.

## ... for a fast recovery of past skin properties (Mode of action)

Unitamuron H-22 possesses all the characteristics that are important for a moisturizer with an advanced action:

- > Preservation and an increase of skin hydration.
- > A smoothing effect on skin.
- > An increase of skin elasticity.

A clinical study has shown a fast increase of skin hydration and elasticity, while a decrease of skin roughness is noticed after two weeks.



## Biological activity

## A rapid rehydration to recover skin properties... (Clinical efficacy)

Skin moisturization was evaluated on 5 volunteers (aged between 24-57) with a Corneometer CM 825. A placebo, a cream containing 0.15% of hyaluronic acid (as a benchmark) and a cream containing 3% of Unitamuron H-22 were applied twice a day on the inner surface of the forearm for 15 days.

Result: Thanks to its great propensity to capture water, Unitamuron H-22 improves skin hydration by 17% after 8 days.

#### Rapid improvement of skin hydration

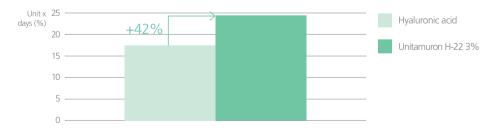


## ... confirmed in a long term view for a stronger skin (Clinical efficacy)

Skin moisturization was evaluated on 5 volunteers (aged between 24-57) with a Corneometer CM 825. A placebo, a cream containing 0.15% of hyaluronic acid (as a benchmark) and a cream containing 3% of Unitamuron H-22 were applied twice a day on the inner surface of the forearm for 15 days.

Result: Over the two weeks of treatment, Unitamuron H-22 confirms its capacity to improve skin hydration by 42% compared to hyaluronic acid.

## Improvement of skin hydration in a long term view (area under the curve)



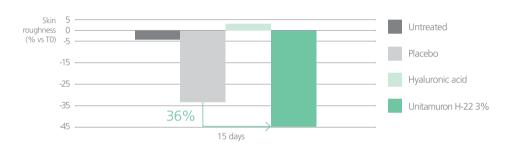
## Efficacy

### Increase of hydration leads to visibly smoother skin (Clinical efficacy)

Skin roughness was quantitatively assessed on 5 volunteers (aged between 24-57) with a Skinvisiometer SV 500. A placebo, a cream containing 0.15% of hyaluronic acid (as a benchmark), and a cream containing 3% of Unitamuron H-22 were applied twice a day on the inner surface of the forearm for 15 days.

Result: Unitamuron H-22 reduces skin roughness by 36% compared to placebo, within 15 days, unlike hyaluronic acid which has no effect.

#### Fast improvement of reduction of skin roughness

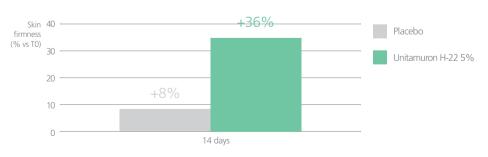


### Important increase of skin elasticity (Clinical efficacy)

Skin elasticity was measured on 5 women volunteers (aged between 29-44) with a Cutometer SEM 474. A placebo and a cream containing 5% of Unitamuron H-22 were applied twice a day on the inner surface of the forearm for 14 days.

Result: After 14 days, Unitamuron H-22 improves skin elasticity by 36%.

#### A much more elastic skin



## Summary

### Technical information

INCI: Water, Pentylene Glycol, Tamarindus Indica Seed Gum

Other commercial version available: Unitamuron BG-22

INCI Unitamuron BG-22: Water, Butylene Glycol, Tamarindus Indica Seed Gum

Origin: Tamarind

Preservation: Preservative-free

Appearance: Colorless, slightly opalescent liquid

Solubility: Water-soluble

Dosage: 2-5%

Processing: Can be incorporated into any formula in the water phase at a pH between 5.0

and 8.0 and temperature below 50°C

#### Claims

Claims: Moisturizes, firms, smoothes, anti-wrinkle

Applications: Moisturizing creams, anti-aging products, anti-wrinkle products, primer, lip care, and rinse-off products

#### Induchem AG

Industriestrasse 8a CH-8604 Volketswil T +41 44 908 43 33 F +41 44 908 43 30

#### Induchem USA, Inc.

535 Fifth Avenue, Floor 23 New York, NY 10017, USA T 212-756-9918 F 212-756-9942 salesusa@induchem.com

#### Induchem (France) SAS

171 bis Avenue Charles de Gaulle FR-92200 Neuilly sur Seine T +33 (0)1 40 88 10 97 F +33 (0)1 40 88 11 99 ventes@induchem.com

www.induchem.com



cosmetic engineering

This information and all further technical advice is based on our present knowledge and experience. However, it implies no liability or other legal responsibility on our part, including with regard to existing third party intellectual property rights, especially patent rights. In particular, no warranty, whether express or implied, or guarantee of product properties in the legal sense is intended or implied. We reserve the right to make any changes according to technological progress or further developments. The customer is not released from the obligation to conduct careful inspection and testing of incoming goods. Performance of the product described herein should be verified by testing, which should be carried out only by qualified experts in the sole responsibility of a customer. Reference to trade names used by other companies is neither a recommendation, nor does it imply that similar products could not be used.

LEAFLET-H22-09.12-1000