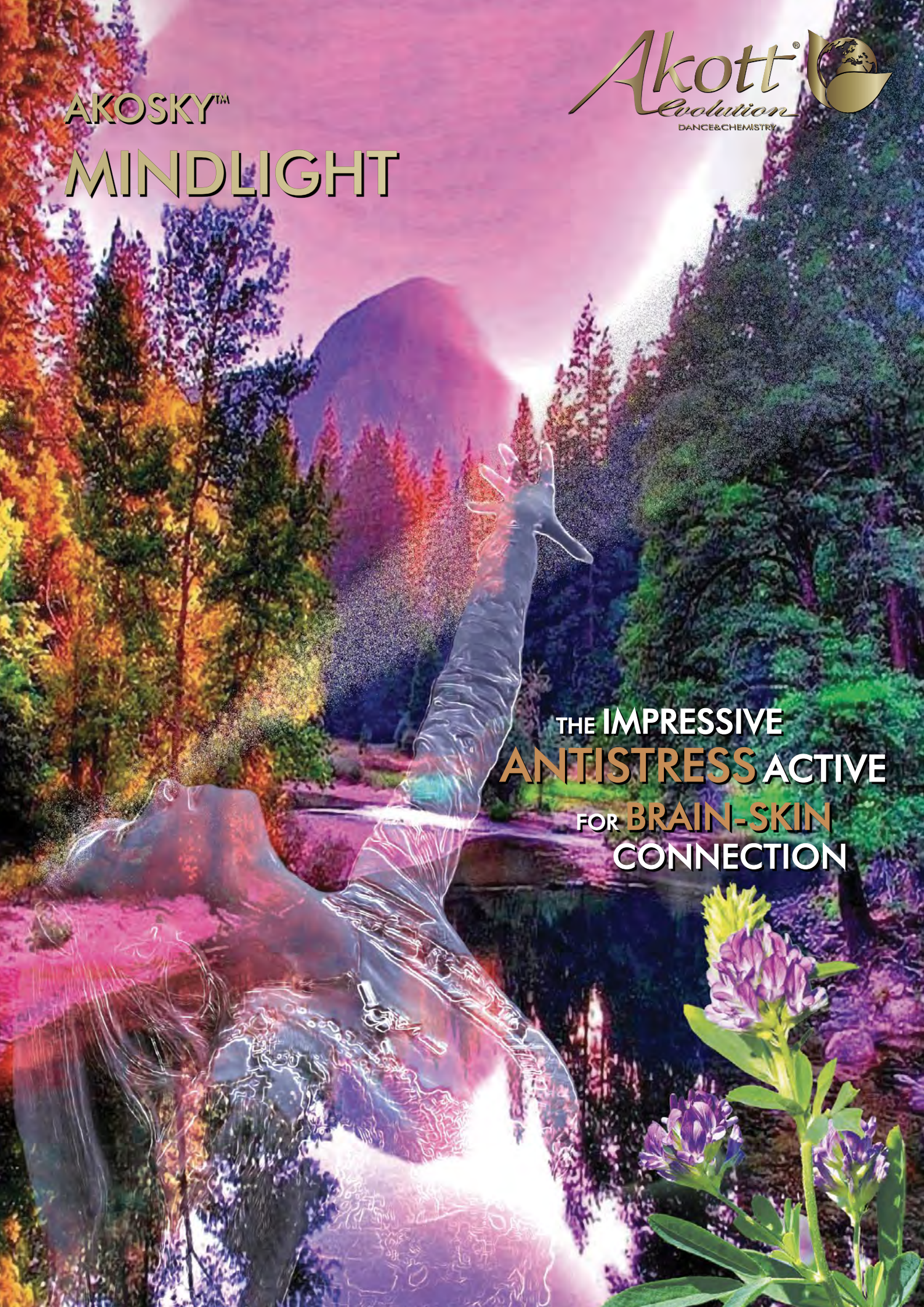


AKOSKY™

MINDLIGHT

THE IMPRESSIVE
ANTISTRESS ACTIVE
FOR **BRAIN-SKIN**
CONNECTION



THE CONCEPT

Expression Wrinkles and Skin Damage Reducer

Psychological stress has negative effects on healthy skin, affecting its integrity and function. This is due to the activation of the cutaneous and central HPA axis, and the 11β -HSD1 enzyme that converts cortisone to cortisol.

Akott has developed **AKOSKY™ MINDLIGHT**, the natural stress reliever Active with fresh **Alfalfa Sprouts**, which has the impressive ability to act on cortisol biosynthesis, thus preventing skin aging and skin damage such as skin redness, typical of stressed skin.

The name has been inspired by the “**Brain-Skin Connection**” because the skin is essentially a large painting that depicts exactly what is happening in our minds. If you are stressed **AKOSKY™ MINDLIGHT** keeps your skin calm to brighten yourself.

ORIGIN

Fresh Alfalfa (*Medicago Sativa*) Sprouts Concentrate

ECO SUSTAINABLE SOLUTION

The extract is produced under controlled conditions, saving water, and avoiding plant depletion from the environment.

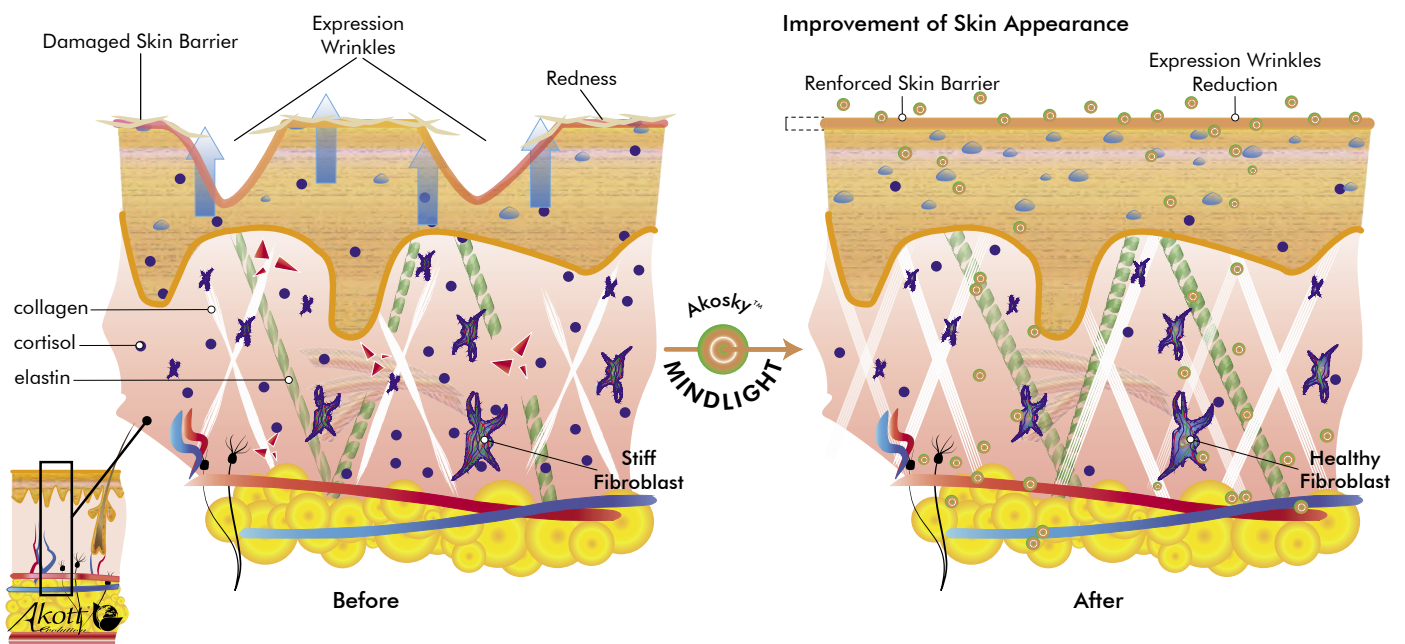
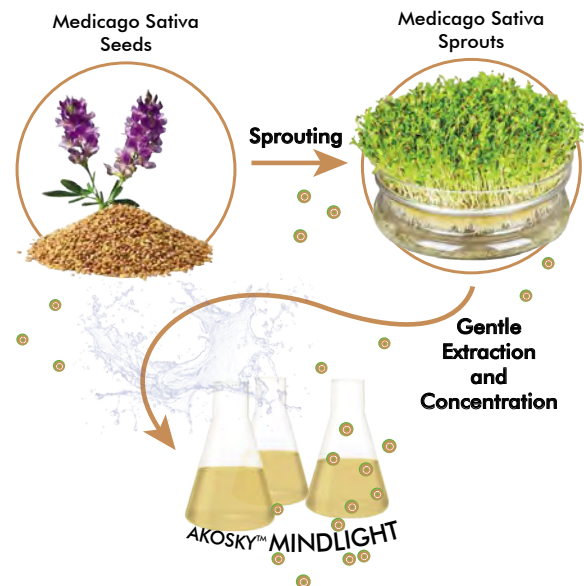
EFFICACY

In vitro testing shows reduced Cortisone-induced cortisol levels and increased proliferation of human keratinocytes compared to cortisone-treated cells. Furthermore, it shows reduced fibroblast stiffness (general aging marker) caused by cortisol.

Clinical studies, on subjects who declare to be stressed, show visible wrinkles reduction in the glabellar, forehead, and nasolabial areas (expression wrinkles), improvement of skin elasticity, improvement of epidermis thickness, reduction of Trans Epidermal Water Loss (TEWL), reduction of skin redness and skin radiance improvement.

MECHANISM OF ACTION

Triterpenoid saponins and phenolic compounds in **AKOSKY™ MINDLIGHT** counteract skin signs induced by psychological stress by acting on cortisol biosynthesis. The decrease in cortisol levels by **AKOSKY™ MINDLIGHT** leads to a decrease in fibroblast stiffness.



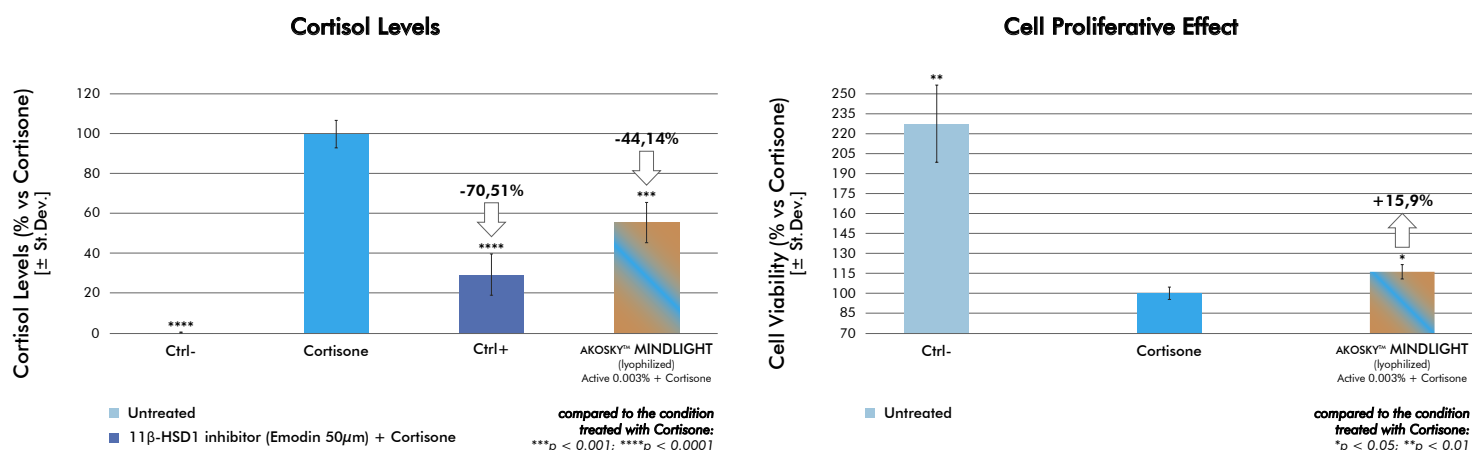
EFFICACY EVALUATION

RESULTS

LABORATORY STUDY (*in vitro*)

CORTISOL BIOSYNTHESIS

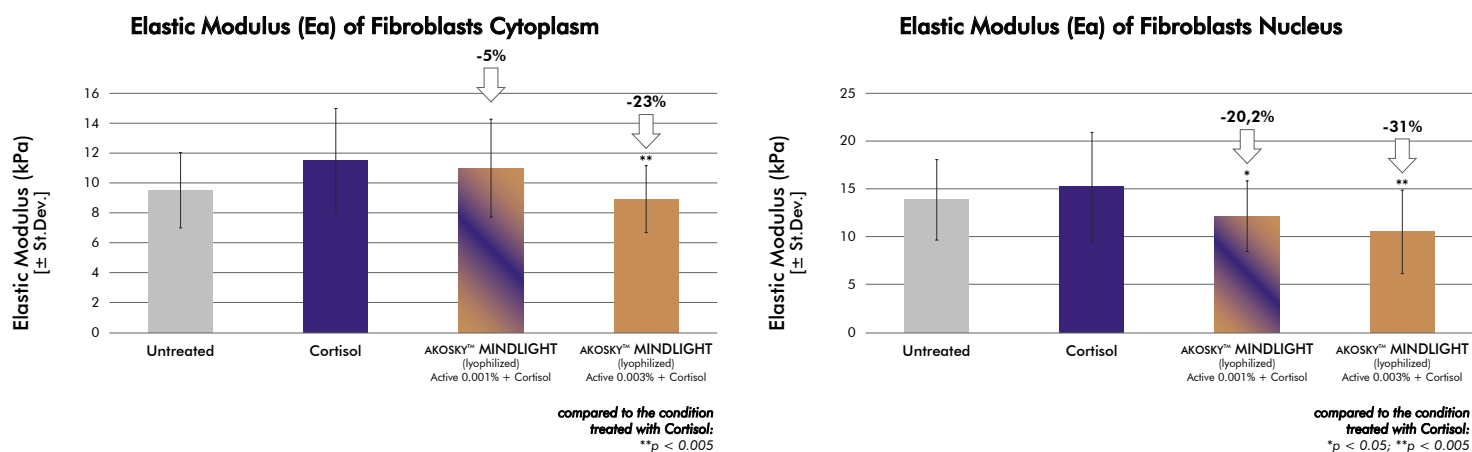
Normal Human Epidermal Keratinocytes (NHEK) were incubated in the presence of cortisone 10^{-3} M and **AKOSKY™ MINDLIGHT** pure active powder for 72h. Cell viability by MTT assay was analyzed, and cortisol levels by ELISA assay were quantified.



AKOSKY™ MINDLIGHT induced cell proliferation and reduced Cortisone-induced cortisol levels, in a similar manner than observed for the 11β-HSD1 inhibitor, thus preventing damage caused by cortisol excess in skin cells.

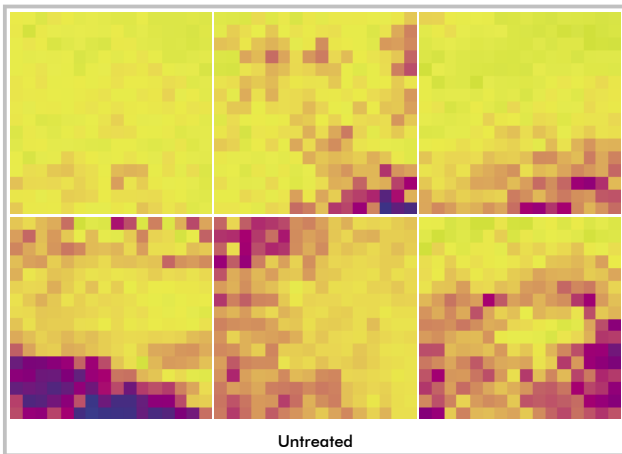
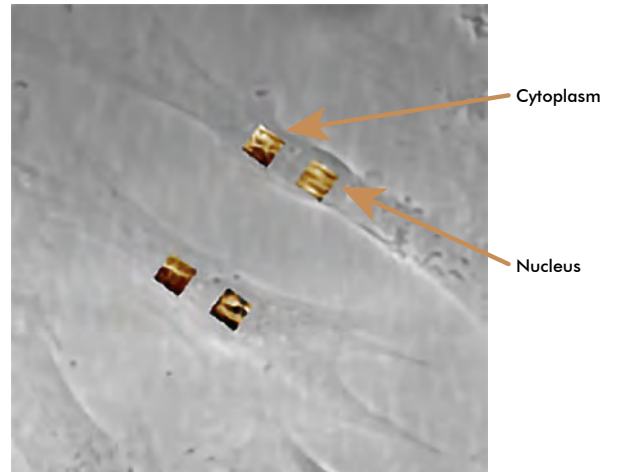
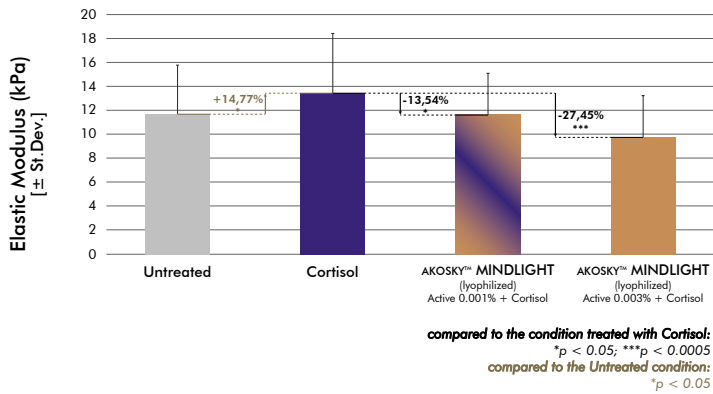
FIBROBLAST STIFFNESS

Primary human dermal fibroblasts from a 30-year-old donor were incubated with cortisol [300nM] and different concentrations of **AKOSKY™ MINDLIGHT** pure active powder for 7 days. Atomic Force Microscope measurements were performed to measure the mechanical properties of the cells, obtaining the elastic modulus (Ea) in the nucleus and cytoplasm of the cells. A decrease of Ea corresponds to a decrease of stiffness.



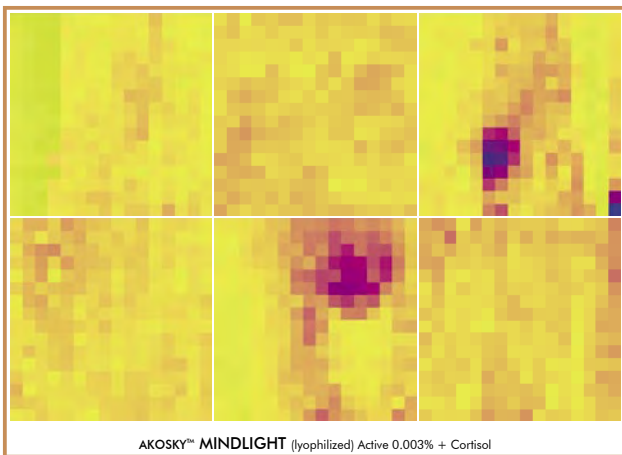
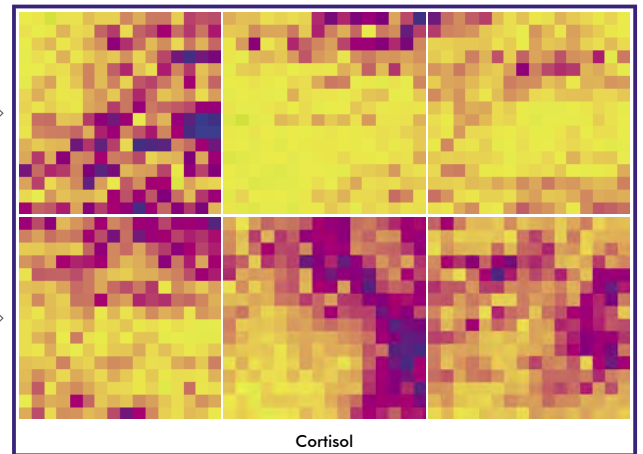
EFFICACY EVALUATION

Global Cell Elastic Modulus (Ea) of Fibroblasts



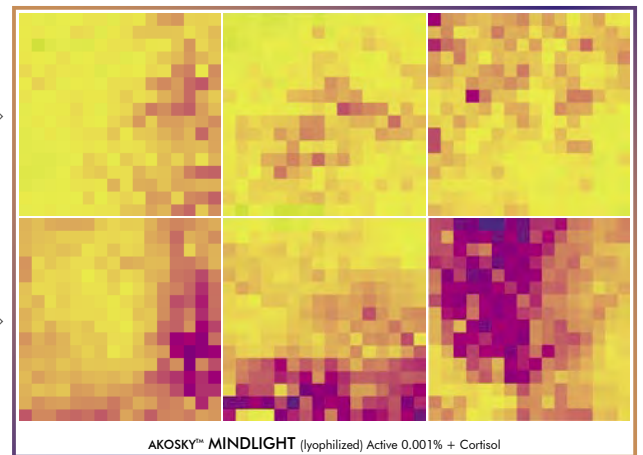
← Cytoplasm →

← Nucleus →



← Cytoplasm →

← Nucleus →



Representation of stiffness maps of all conditions.
 Colorimetric scale illustrating the stiffness profile.

It has been demonstrated that cortisol increases in a significant manner the fibroblast stiffness.
AKOSKY™ MINDLIGHT 0,001% counteracts the cortisol effect, and
AKOSKY™ MINDLIGHT 0,003% shows a great anti-age effect in addition to counteract the cortisol effect.

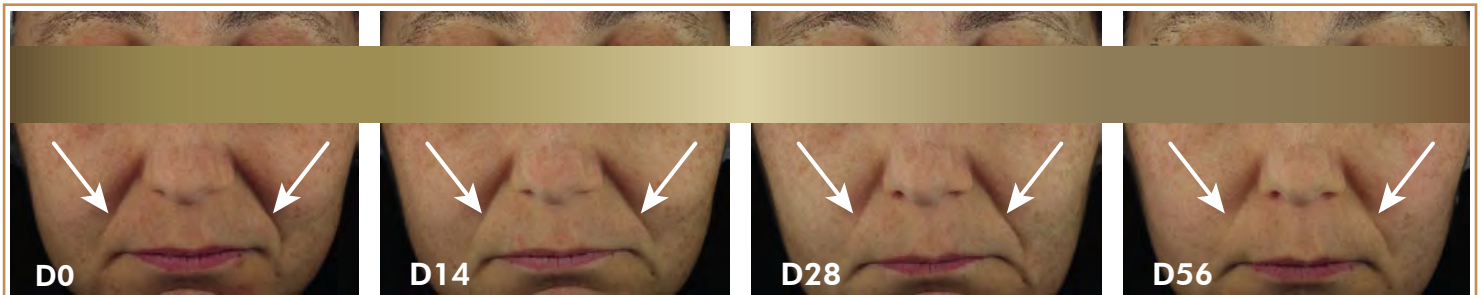
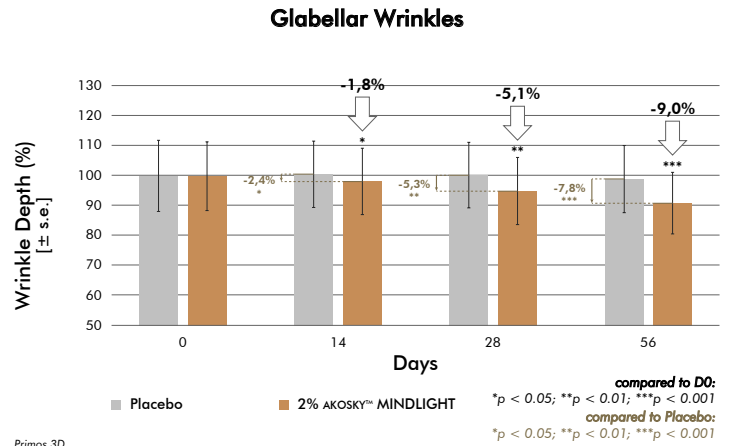
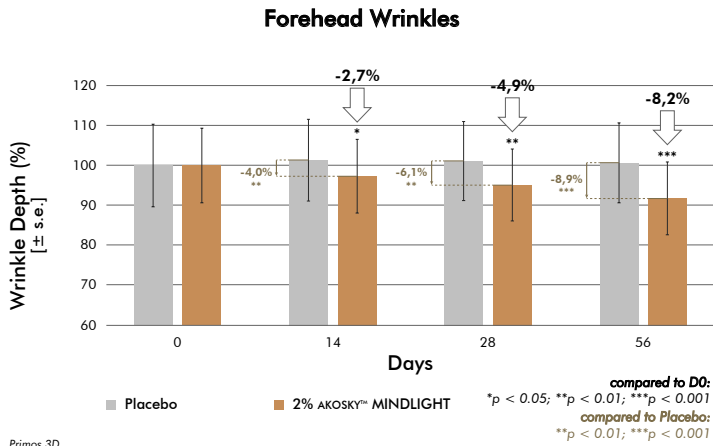
EFFICACY EVALUATION

RESULTS

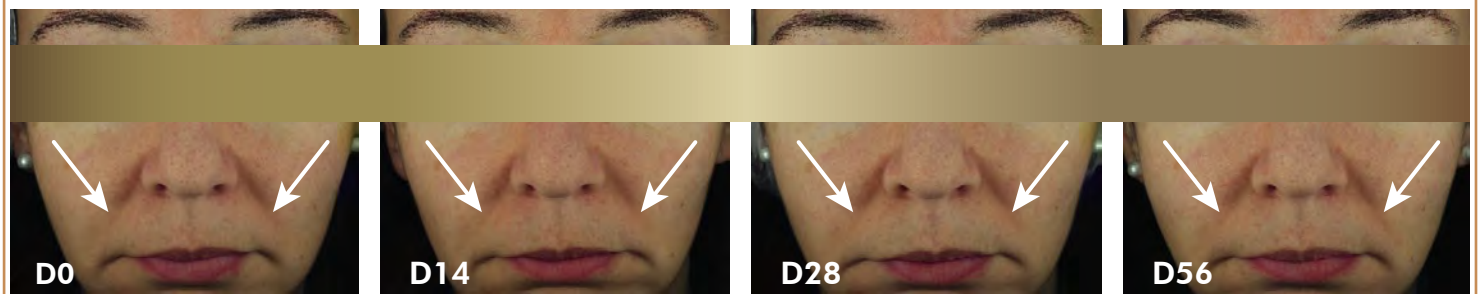
CLINICAL STUDY

30 healthy female volunteers aged 30-45, who declare to be stressed or anxious according to the "Perceived Stress Scale" questionnaire, were divided into two groups. The first group applied twice a day a face product containing **AKOSKY™ MINDLIGHT** at 2%, and the other one applied a placebo formulation, for 56 days.

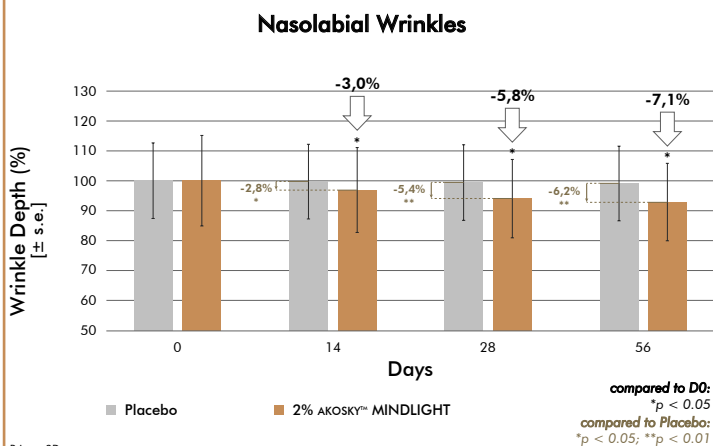
DECREASE THE DEPTH OF EXPRESSION WRINKLES



Nasolabial Wrinkles reduction on a 45 years old female volunteer



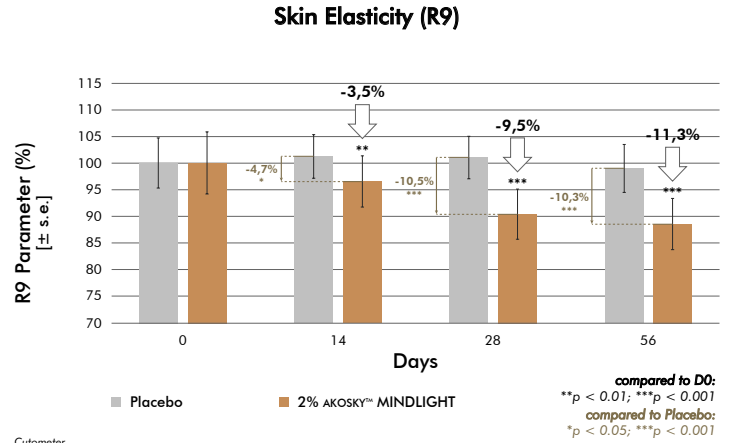
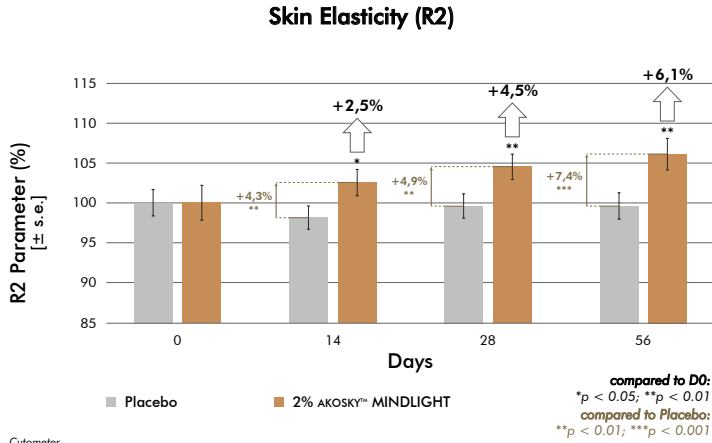
Nasolabial Wrinkles reduction on a 37 years old female volunteer



AKOSKY™ MINDLIGHT
at 2%
DECREASES SIGNIFICANTLY EXPRESSION WRINKLES
ALREADY AFTER 14 DAYS

EFFICACY EVALUATION

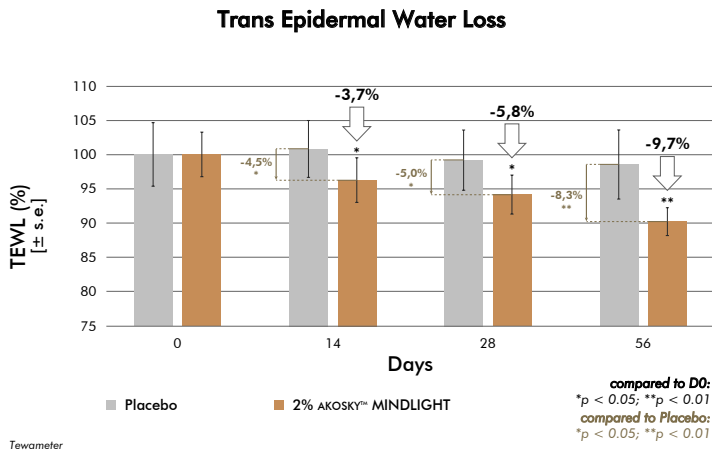
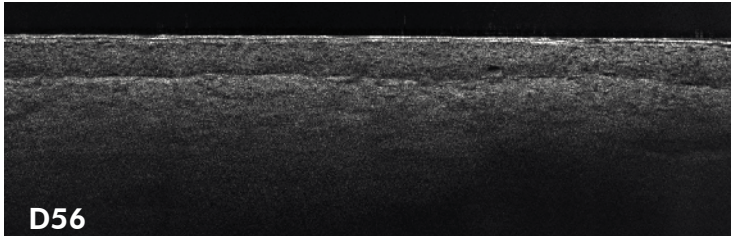
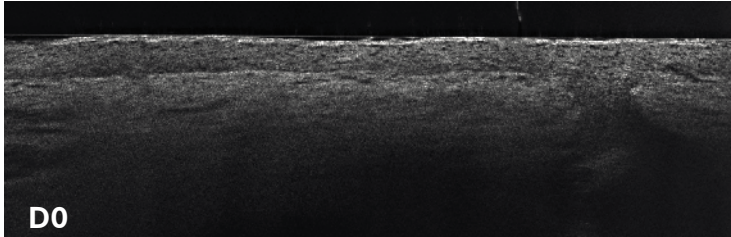
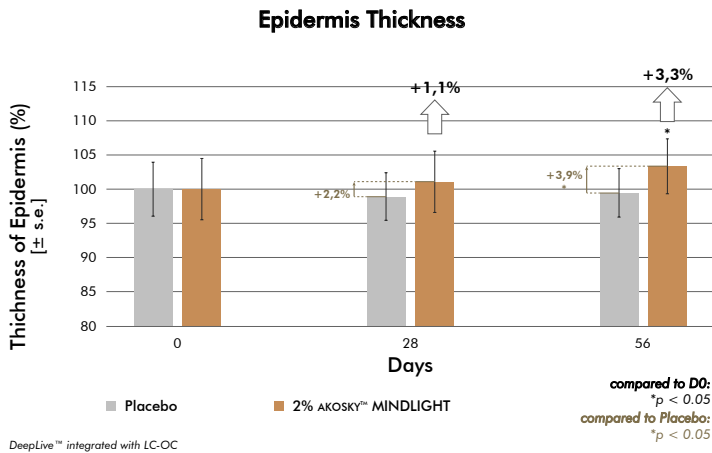
SKIN MECHANICAL PROPERTIES IMPROVEMENT



R2 represents the gross-elasticity. AKOSKY™ MINDLIGHT shows an improvement of R2 values, which indicates an improvement of SKIN ELASTICITY.

R9 represents the tiring effects of the skin. The smaller the value of R9, the smaller the tiring effects are. AKOSKY™ MINDLIGHT shows a decrease of SKIN TIRING.

SKIN BARRIER PROTECTION



33 years old female treated with AKOSKY™ MINDLIGHT 2%

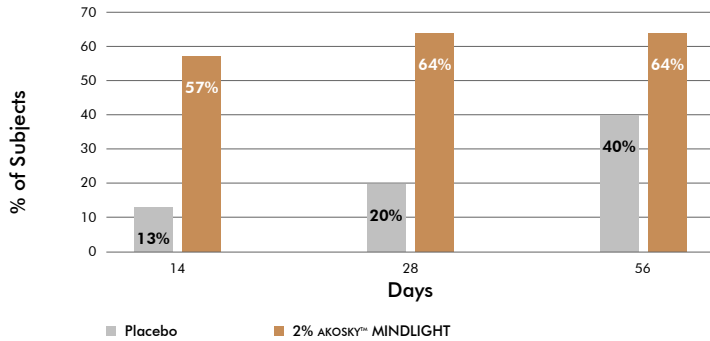
Epidermis thickness is measured by Line-field confocal optical coherence tomography (LC-OCT) technology by DeepLive™, which provides a unique 3D imaging modality, allowing a histology-like vertical mode and recording a 3D stack of tissue volumes in situ.

Stress leads to decreased skin barrier integrity. AKOSKY™ MINDLIGHT strengthens the skin barrier, acting on the regeneration of the epidermal thickness and on the improvement of Trans Epidermal Water Loss.

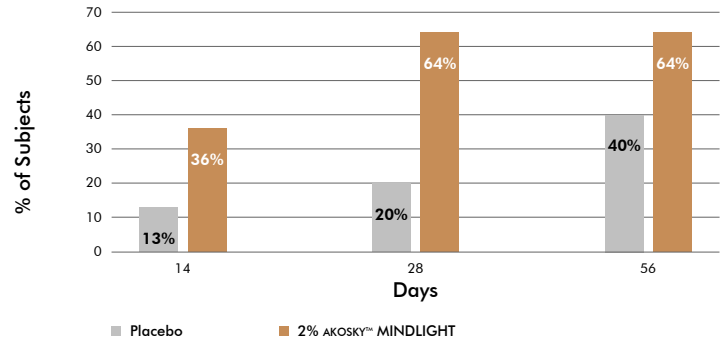
EFFICACY EVALUATION

SKIN REDNESS AND RADIANCE IMPROVEMENT

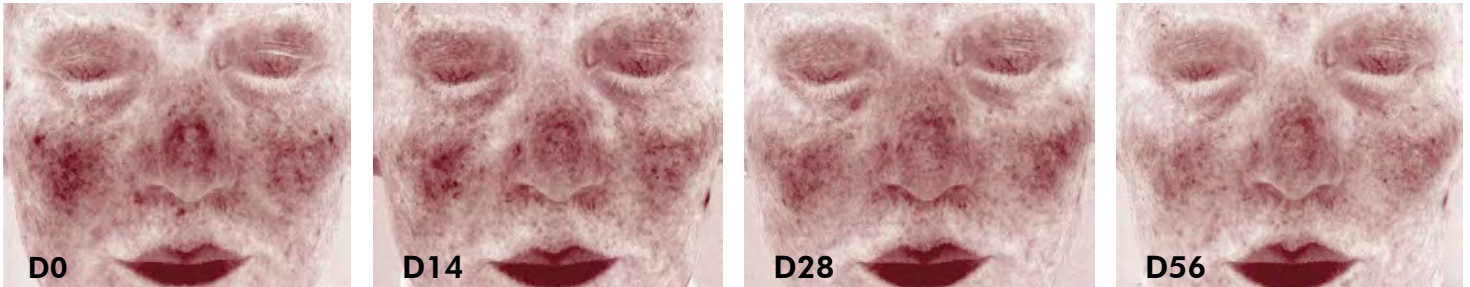
Skin Redness Improvement



Skin Radiance Improvement



The positive effect on the measured parameter is confirmed if more than 50% of the subjects register an improvement.



Skin Redness reduction on a 36 years old female volunteer

The dermatological analysis highlights an improvement of skin redness and skin radiance in 64% of the subjects!

Self-Evaluation

My skin is more relaxed	93% volunteers
My skin looks more radiant	86% volunteers
My skin is more elastic	93% volunteers
My skin is more firm	93% volunteers
My skin is more hydrated	79% volunteers
My skin redness is reduced	79% volunteers
My skin is more compact	93% volunteers
The appearance of wrinkles/fine lines is reduced	86% volunteers
Expression lines on the forehead are reduced	86% volunteers
Glabellar expression lines are reduced	86% volunteers
Nasolabial expression lines are reduced	86% volunteers
My skin looks rejuvenated/younger	93% volunteers
My skin evenness is improved	86% volunteers
The treatment is suitable for my skin type	100% volunteers
Is the product well tolerated?	100% volunteers
Would you buy a cosmetic product containing an active ingredient that fights the skin signs caused by psychological stress?	100% volunteers

PRODUCT INFORMATION

INCI name: Glycerin, Aqua (Water), Medicago Sativa (Alfalfa) Seed Extract

CAS number: 56-81-5, 7732-18-5, 84082-36-0

EINECS number: 200-289-5, 231-791-2, 281-984-0

REGULATORY: EU, USA, China, Japan

APPEARANCE: Liquid from light yellow to amber

SOLUBILITY: Hydrosoluble

USE: Recommended dosage is 2%

FORMULATION TIPS: The product is liquid and easy to use. Recommended pH range is 3-8.

SAFETY DATA: AKOSKY™ MINDLIGHT has been tested for cytotoxicity and skin tolerance and has demonstrated a good safety profile

PRESERVATIVES: Potassium Sorbate, Sodium Benzoate

COSMOS: Compliant

HALAL: Compliant

VEGAN: Friendly

COSMETIC PROPERTIES

RE-EQUILIBRATION OF CELL CORTISOL LEVEL
MINIMIZES THE APPEARANCE OF EXPRESSION LINES
IMPROVES SKIN THICKNESS
INCREASES SKIN ELASTICITY
SKIN BARRIER STRENGTHENING
REDUCES SKIN REDNESS
IMPROVES SKIN APPEARANCE

APPLICATIONS

ANTI-STRESS PRODUCTS
DAILY AND NIGHT CARE
ANTI-WRINKLES
ANTI-REDNESS CREAM
CIRCADIAN PRODUCTS
HAIR CARE PRODUCTS
MAKE-UP PRODUCTS

CLINICALLY TESTED FORMULATION

ANTI-STRESS GEL

PHASE	INGREDIENT	%
A	Purified Water	to 100
	Glycerin	0.15
	AKOSKY™ MINDLIGHT	2.00
B	Sodium Acrylates Copolymer, Lecithin	1.30
C	Phenoxyethanol, Ethylhexylglycerin	1.00



CONCLUSIONS

The clinical study demonstrates the ability of **AKOSKY™ MINDLIGHT** to improve skin elasticity, skin mechanical properties, skin barrier protection, skin redness and expression wrinkles depth, reducing the unwanted effects on the skin caused by stress conditions.

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