



RejuveNAD™

Naturally boosts NAD⁺ for skin longevity

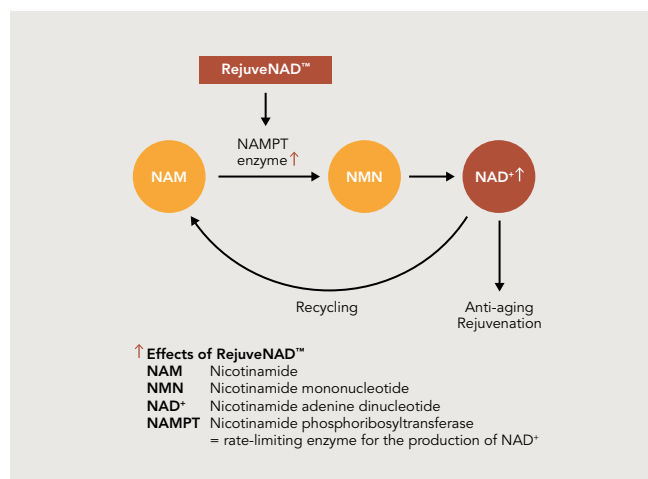
RejuveNAD™ is a holistic approach for skin rejuvenation that targets the very essence of age-related processes, the “hallmarks of aging”. RejuveNAD™ optimizes cellular processes to revitalize the skin by naturally boosting the longevity molecule NAD⁺.

The issue

Over the last couple of years, the new health and wellbeing trend molecule NAD⁺ (nicotinamide adenine dinucleotide) has gained widespread recognition for its role in promoting longevity. Reduced NAD⁺ levels are linked to accelerated aging and shorter lifespans in various organisms. NAD⁺ is a crucial coenzyme in energy metabolism and supports numerous cellular processes. It is essential for ATP production and serves as a substrate for enzymes involved in DNA repair, epigenetic changes, and the regulation of cellular metabolism by sirtuins. NAD⁺ declines with age, but replenishing it can reverse age-related changes and extend lifespan. Insufficient NAD⁺ levels contribute to skin UV sensitivity, impaired DNA repair, genomic instability, cellular senescence, and accelerated skin aging.

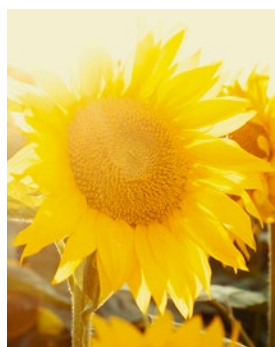
The solution

RejuveNAD™ naturally boosts NAD⁺ levels by enhancing the expression of the rate-limiting enzyme NAMPT, which results in improved cellular processes and skin rejuvenation. Our clinical findings unveiled a remarkably youthful look that can potentially take 8 years off one’s visual age.



The benefits

- Boosts NAD⁺ levels
- Tackles 5 hallmarks of aging
- Energizes mitochondria and promotes DNA repair
- Makes the skin appear 8 years younger



Source

The sunflower (*Helianthus annuus*) is a perennial flowering plant that is native to North America. The sprouts of this fast growing plant have the highest concentration of phytonutrients, the compounds in plants that are known for their health promoting properties. The sunflower sprouts used for the production of RejuveNAD™ are cultivated indoors without soil in a carefully controlled and sustainable process.

INCI (EU/PCPC) Declaration: Helianthus Annuus (Sunflower) Sprout Extract (and) Maltodextrin (and) Aqua/Water (COSMOS approved* and NATRUE certified).

Study results

Increase in NAMPT Expression

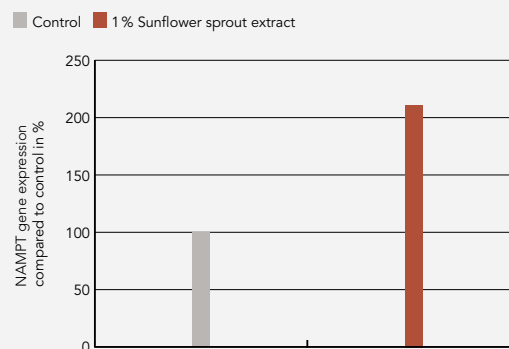
S-983



Cell line: Human dermal fibroblasts
Test compound/ treatment: Incubation of cells in the presence and absence of sunflower sprout extract for 48 hours
Parameters: Gene expression of NAMPT

→ The sunflower sprout extract boosted NAMPT gene expression by 111 %

→ Potential to activate NAD⁺ production and recycling



Increase in NAD⁺ Levels

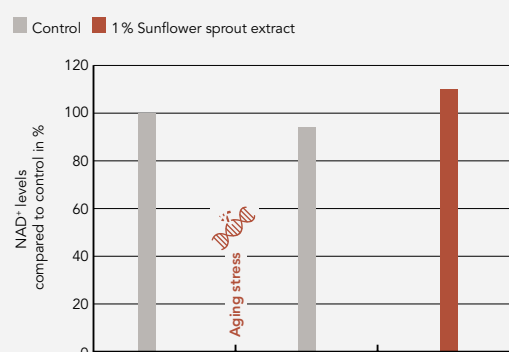
S-1119



Cell line: Human epidermal keratinocytes with induced DNA damage
Test compound/ treatment: Keratinocytes were treated with BrdU (induces aging via DNA damage) in the presence or absence of 1 % sunflower sprout extract for 24 hours
Parameters: NAD⁺ levels in the cell lysate

→ Sunflower sprout extract restored depleted NAD⁺ levels, surpassing the control levels

→ Boosts NAD⁺ in skin cells, even during aging



Visible Improvement of Aging Signs

S-1184



Volunteers: 22 women (52–65y)
Test compound: Cream containing 2% RejuveNAD™, placebo
Treatment: Application of test product and placebo twice daily for 42 days, on each side of the face

→ RejuveNAD™ shows a visible improvement in aging signs (reduction of wrinkles, reshaping effect)

→ RejuveNAD™ made the skin on average appear 8.2 years younger after 42 days



In Addition

Rejuvenating effects: Further *in vitro* and *ex vivo* studies have demonstrated that RejuveNAD™ increases collagen density, provides an energizing effect (increase in ATP levels), enhances the longevity marker sirtuin 1, reduces DNA damage, regulates epigenetic alterations, and dampens the development of senescence. Moreover, clinical studies have revealed that RejuveNAD™ significantly reduces age spots, improves skin smoothness, and exhibits potential for facial lifting.

Recommended use level: 2 %

Characteristics: Powder, water-soluble, without alcohol, without preservatives

Applications: Deep wrinkle facial serums, repair and rejuvenation treatments, intensive anti-aging masks, densifying skin concentrates, facial reshaping fluids, skin energy boosters

Moreover: Organic source, cultivated sustainably by indoor farming. COSMOS approved and NATRUE certified

Benefits RejuveNAD™

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- Energizes mitochondria and promotes DNA repair
- Makes the skin appear 8 years younger