ALPHASCIENCE

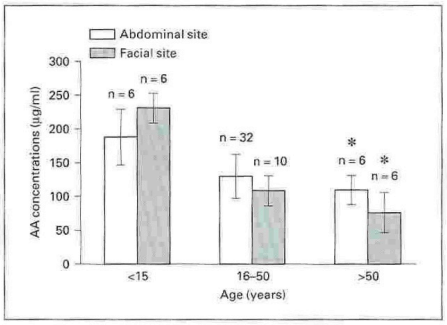
INNOVATIVE • SKIN • SCIENCE

SCIENTIFIC EVIDENCE: ALPHASCIENCE antioxidant serum is active for 10 hours inside the skin, with a reservoir effect.

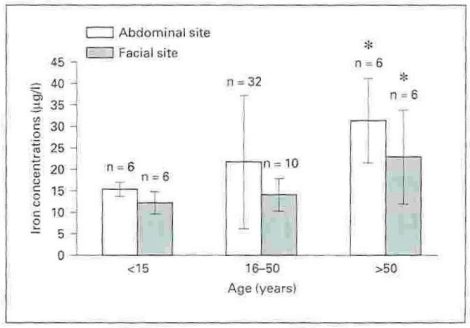
With aging, vitamin C level decreases in the body and should be compensated

Ascorbic acid (vitamin C) level in the body decreases while iron levels increase, which is responsible for skin aging and mainly brown spots[1]

Vitamin C decreases with age



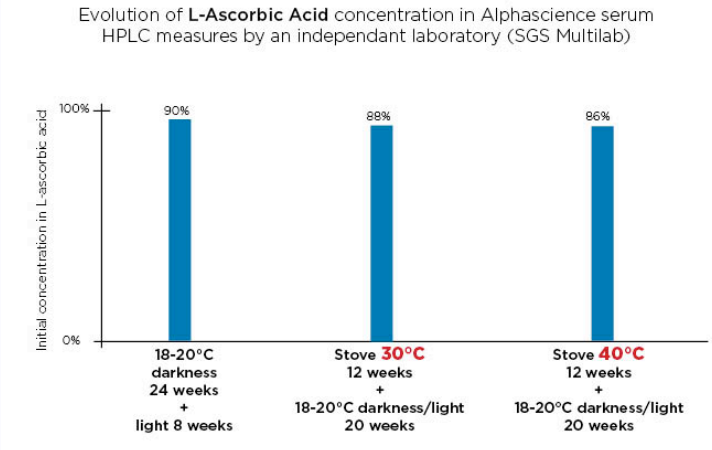
While iron level increases



It is therefore very important to bring pure vitamin C (L-ascorbic acid) to the skin to scavenger iron and therefore avoid pigmentation disorders in addition to block oxidative stress.

Alfred Marchal PhD developed the best technology worldwide to stabilize antioxidant complexes in our serums

For the first time, stability proofs even at hot temperature (tested more than 3 months at 40° C)



Remark: the stability in the bottle is not enough to be sure that we really protect the skin against oxidative stress induced by UV, pollution, hormonal changes…

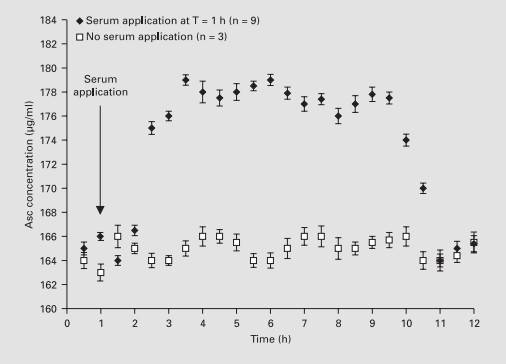
1. the antioxidant serum needs to penetrate into the skin and impregnate all the skin layers including the dermis, to be effective and protect and repair skin cells.

[1] Iron and Ascorbic Acid Concentrations in Human Dermis With Regard to Age and Body Sites. Gerontology. Nathalie Leveque 1 , Sophie Robin, Safwat Makki, Patrice Muret, André Rougier, Philippe Humbert

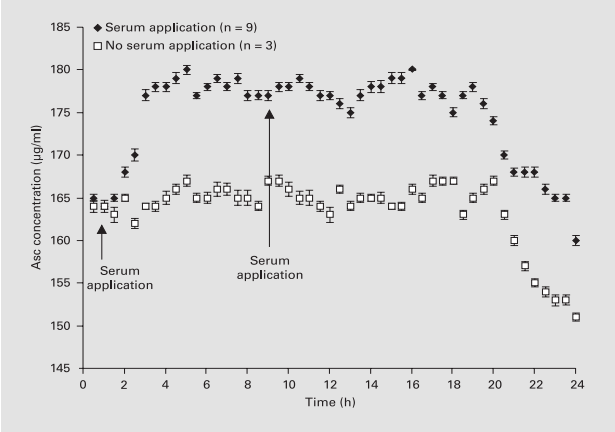
2. The antioxidant complex needs to be stable inside the skin: the human skin contains potent degradation factors (enzymes, water, heat…), associated with external factor (UV, pollution…), they will quickly destroy the antioxidants, especially vitamin C

2/ Alfred MARCHAL is the only scientist who proved that its antioxidant complex penetrates into the dermis and keeps its stability inside the skin.

Increase of vitamin C level in the dermis for 10 hours after first application of the antioxidant serum



Reservoir effect, Increase of vitamin C level for 12 hours after second application



This study was made by Pr Philippe HUMBERT for Alfred Marchal, on his antioxidant complex associating 8% L-ascorbic acid with 30% ginkgo biloba[2]



ALFRED MARCHAL: a brilliant scientist and inventor

Alfred MARCHAL, PhD in organic chemistry, is an internationally recognized antioxidants and aesthetic medicine expert. He has a 35-year academic experience in R&D for pharmaceutical organic synthesis and phyto pharmaceuticals.

He is author of many scientific papers and patents in particular on vitamin C, vitamin K and hyaluronic acid.

He is now ALPHASCIENCE Head of Science and works on new innovative anti-aging molecules, stabilization and delivery systems.

[2] Ex vivo Cutaneous Absorption Assessment of a Stabilized Ascorbic Acid Formulation Using a Microdialysis System N. Leveque, P. Muret, S. Makkia, S. Mac-Mary, J.P. Kantelip, P. Humbert