



MESOLIS RANGE

REHYDRATING TO PERFECTION

USE THE MESOTHERAPY APPROACH TO REJUVENATE THE DERMIS...

What is mesotherapy?

This is a medical process based on injections of microscopic quantities of medication directly into the skin.

Mesotherapy's principle is: "inject little, infrequently, in the right place".

Developed in 1952 by the French doctor Michel Pistor, it was recognized in 1987 by the French Academy of Medicine and started to be used, in the same year, for skin rejuvenation as well.

What is the Mesolis range?

Why is it unique?

Between 2000 and 2004, three generations of resorbable gels dedicated to rejuvenation treatments of the dermis were developed, all three exclusively manufactured from non-cross-linked NaHA, with an adapted concentration.

In 2006, Anteis developed and launched a fourth generation of ready-to-use products, with unique properties: the Mesolis range.

The Mesolis range is comprised of two products, essentially made with non-cross-linked NaHA of non-animal origin, with distinct concentrations and formulations:

- Mesolis, exclusively made from hyaluronic acid.
- Mesolis+, with a unique formulation combining hyaluronic acid and glycerol.

Mesolis+ is the only gel dedicated to rehydration treatments of the dermis,

- combining the hydrating properties of hyaluronic acid and glycerol,
- benefiting from the highest concentration in hyaluronic acid and a very high molecular weight.

THE MESOLIS RANGE - A REALLY UNIQUE SOLUTION TO PREVENT AND CORRECT THE EFFECTS OF CUTANEOUS AGING

What do Mesolis and Mesolis+ aim at?

Skin rejuvenation treatments with Mesolis and Mesolis+ aim at preventing and compensating for the aging effects on the skin, through superficial micro-injections into the dermis, due to several factors:

- environmental factors (pollution, climate...)
- lifestyles (smoking, prolonged sun exposure...)
- hormonal imbalances (linked to maternity, menopause...)
- secondary effects after aggressive aesthetic treatments (micro-dermabrasion, chemical peeling...)

They help:

- prevent the formation of wrinkles
 - smooth away fine lines
 - give tired and dried out skin back all its radiance, tone and elasticity
 - decrease the fatty mass contained in the dermis (cellulite).
-

WITH MESOLIS AND MESOLIS+ "1+1=4"

4 key advantages due to the natural synergy of 2 powerful hydrating substances to give your patients' skin back all the elasticity, tone and radiance of its youth.

1 AGENTS WITH EXTRAORDINARY WATER-RETAINING POWER

FOR PERFECT REHYDRATION OF THE SKIN

2 A UNIQUE FORMULA, INCLUDING GLYCEROL,

FOR A STRENGTHENED REHYDRATING POWER

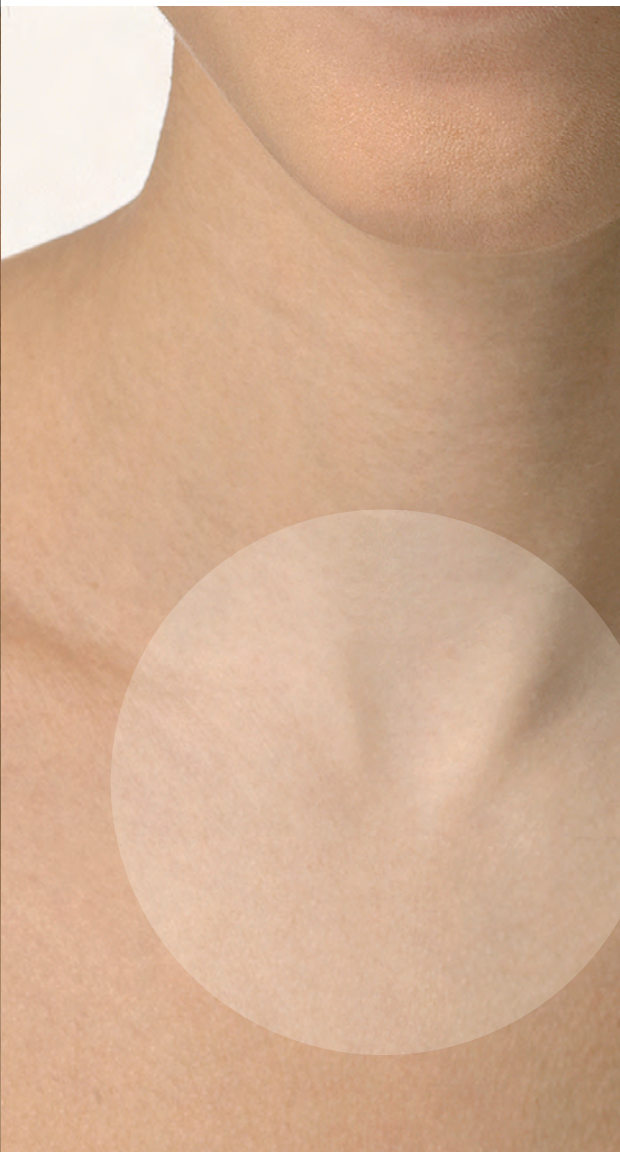
3 COMPONENTS NATURALLY OCCURRING IN THE HUMAN BODY

FOR MAXIMUM SAFETY

4 A RECOGNIZED PROTOCOL AND AN ERGONOMIC READY-TO-USE SYRINGE

FOR LONG-LASTING EFFECTS AND COMFORTABLE INJECTIONS

MESOLIS AND MESOLIS+
REHYDRATING TO PERFECTION



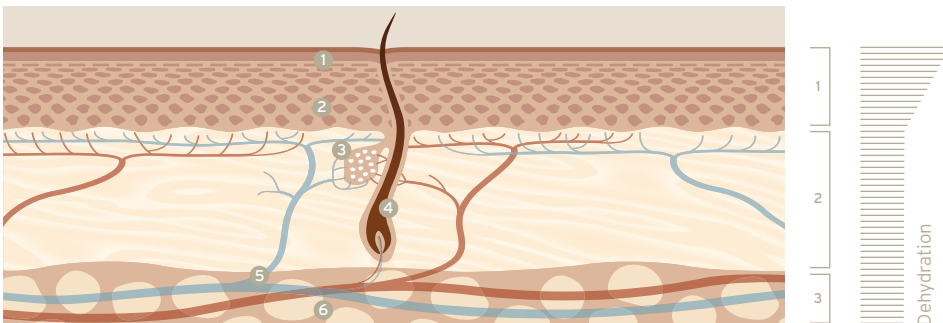
THE LACK OF HA AND GLYCEROL AFFECTS THE HYDRATION RATE

There is a clearly established relationship between dehydration and cutaneous aging through the role of two main components:

- **Hyaluronic acid**, a biopolymer naturally present in the human body that is more concentrated at the level of the dermis.
- **Glycerol**, an endogenous poly-alcohol essentially resulting from the deterioration of the triglycerides contained in both the adipose layers and the sebum.¹

The ability of the skin to hold water is primarily related to the upper layer of the dermis, called the stratum corneum (SC). The higher the rates of glycerol and hyaluronic acid contained in the stratum corneum, the better its position to prevent water loss in the skin.^{2,3}

The skin layers



[1] Epidermis [2] Dermis [3] Hypodermis

① Stratum corneum ② Stratum basale ③ Subcutaneous gland ④ Hair ⑤ Blood vessels ⑥ Lipids

As the years go by, the production of glycerol is reduced; as is the concentration of hyaluronic acid in the dermis. And the daily "scrub", which the epidermis undergoes, reinforces their evacuation from the stratum corneum. The result is a decrease in the dermis's hydration rate. In other words, an acceleration of cutaneous aging.

So that the skin recovers all its radiance, tone and elasticity

→ it is absolutely essential to compensate for its loss of hyaluronic acid.

So that the severely dehydrated and mature skin benefits from the optimized and longer-lasting effects of rehydration

→ the compensation in hyaluronic acid must be strengthened by the addition of glycerol.

¹ Hara M. & Al, Selectively reduced glycerol in skin of aquaporin-3-deficient mice may account for impaired skin hydration, elasticity and barrier recovery. J Biol Chem 277: 46616-46621,2002

² Verdier-Sevrain S. & Al, Skin hydration: a review on its molecular mechanisms J Cosmet Dermatol 6, 75-82, 2007

³ Choi E.H. & Al, Is endogenous glycerol a determinant of stratum corneum hydration in humans, J Invest Dermatol 125:288-293, 2005

1. AGENTS WITH EXTRAORDINARY WATER-RETAINING POWER FOR PERFECT REHYDRATION OF THE SKIN

Hyaluronic acid, a water-retaining property to the 1000th power

What makes the HA in the Mesolis range a key agent in the rehydration process is:

- 1 | Its extraordinary capacity to hold water in remarkable proportions:
up to 1000 times its own weight!
 - 2 | Its molecular weight (2.5 MDa), which is one of the highest among rejuvenating products made from non cross-linked NaHA. This means that the HA chains it contains are remarkably long. Indeed, the longer the HA chains are, the longer they last, as free radicals and hyaluronidases need more time to break them. Thus rejuvenating effects last even longer.
 - 3 | Mesolis+ benefits from the highest concentration in hyaluronic acid (18mg/ml) of all the products developed from non-cross-linked NaHA currently on the market. Thus, it offers a maximized water-retaining power compared with other gels dedicated to rejuvenation through rehydration.
-

Glycerol, an essential component for hydration rate maintenance in the skin.

Commonly used in cosmetics as a moisturizing agent for skin hydration and in the pharmaceutical industry as an excipient, this endogenous viscous poly-alcohol compound directly contributes to maintaining the hydration rate of the dermis through 3 factors:

- 1 | Glycerol molecules create, through hydrogen bonds, a network of water molecules (H₂O). Each glycerol molecule can capture as many as 6 water molecules. With glycerol, you benefit from an even more remarkable hydrating effect in terms of rejuvenation.
 - 2 | As glycerol is finally transported, through AQP3¹, to the upper and most dehydrated layer of the epidermis, the stratum corneum, it reinforces the stratum corneum in its role as a barrier to water loss and contributes to preserving the skin's hydration rate.
 - 3 | The protective mantle around HA created thanks to glycerol, increases its resistance against in vivo degradations, in particular against free radical degradation. It allows a long-lasting hydration effect thanks to a better gel remanence.
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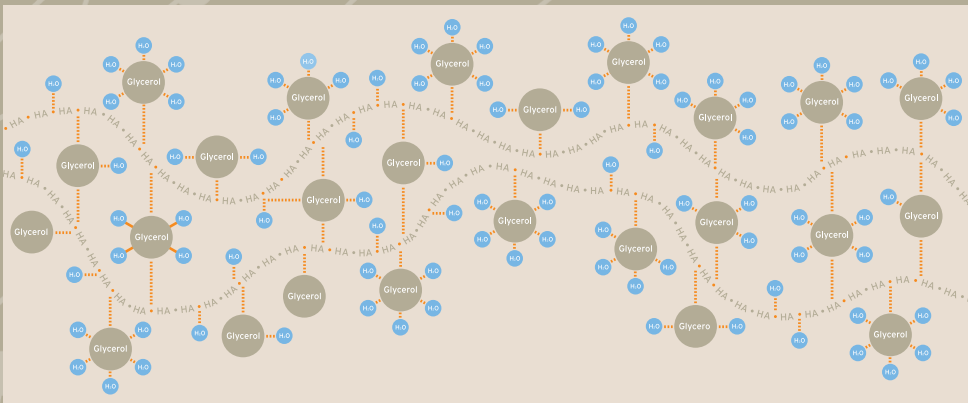
THE SYNERGY OF HYALURONIC ACID AND GLYCEROL: 1+1= EVEN GREATER-HYDRATING PERFORMANCE

¹ AQP3: Aquaporin-3 is a protein channel that allows glycerol to enter the epidermis.

2. A UNIQUE FORMULA, INCLUDING GLYCEROL FOR A STRENGTHENED REHYDRATING POWER

Glycerol, through hydrogen bonds, sets up additional links between HA chains. This therefore creates a more stable, thus solid, matrix which offers a better resistance against in vivo degradations.

Glycerol² combined with HA for a long-lasting hydration effect.

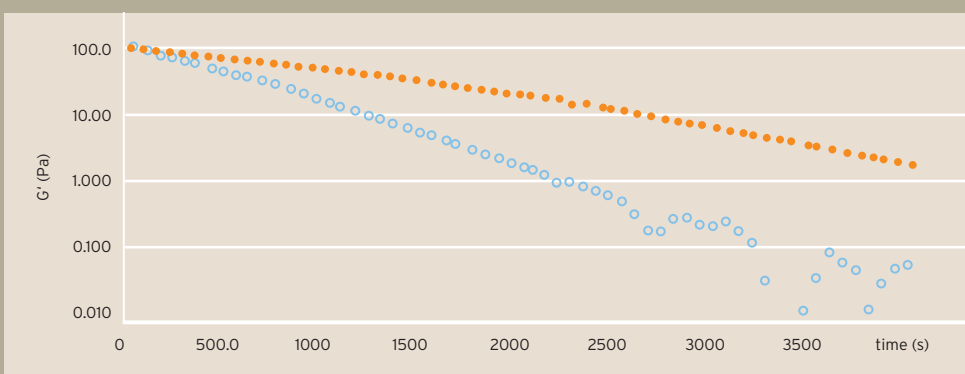


■ Hydrogen bonds
 ■ Water molecule
 Glycerol molecule

Combined with hyaluronic acid, glycerol strengthens its hydrating power through:

- its extremely hydrating properties
- the creation of a protective mantle around hyaluronic acid. This covering protects it against degradations, in particular resistance against free radicals, mechanical pressure and thermal variations.

In vitro tests showing the increased resistance against free radical degradation of an HA gel combined with glycerol.



● Gel based on HA and glycerol
 ● Gel based on HA without glycerol

These curves obtained by rheology (by addition of an oxidizing agent) from HA gels, with and without glycerol, demonstrate that the gel's elasticity (G') remains better in the case of the HA gel with glycerol than the HA gel without glycerol. Consequently, glycerol provides substantial protection of an HA gel against free radical degradation.

² Glycerol + HA: pending and published patent application

3. COMPONENTS NATURALLY OCCURRING IN THE HUMAN BODY FOR MAXIMUM SAFETY

The Mesolis range is safe, perfectly biocompatible and integrally biodegradable. Why?

- The hyaluronic acid and glycerol used in the Mesolis product range are pharmaceutical grade (i.e. of non-animal origin) and highly purified.
- These two components are naturally occurring in the human body. As Mesolis range products are exclusively made from these 2 components, the skin recognizes and fully accepts them.
- In addition, the Mesolis products offer a physiological pH and osmolarity that are in perfect harmony with the dermis for better tolerance of these gels.

| | Mesolis+ | Mesolis |
|-----------------------|-------------------|-------------------|
| HA concentration | 18 mg/ml | 14 mg/ml |
| pH | 6.8 - 7.6 | 6.8 - 7.6 |
| Osmolarity | 280 - 330 mOsm/kg | 280 - 330 mOsm/kg |
| Additional components | Glycerol | - |
| Molecular weight | 2 - 3 MDa | 2 - 3 MDa |

Mesolis and Mesolis+ are so safe that

- secondary effects are considered as virtually non-existent
- no preliminary biocompatibility test is required.

Mesolis and Mesolis+'s safety is reinforced
by the stability of the product guaranteed by

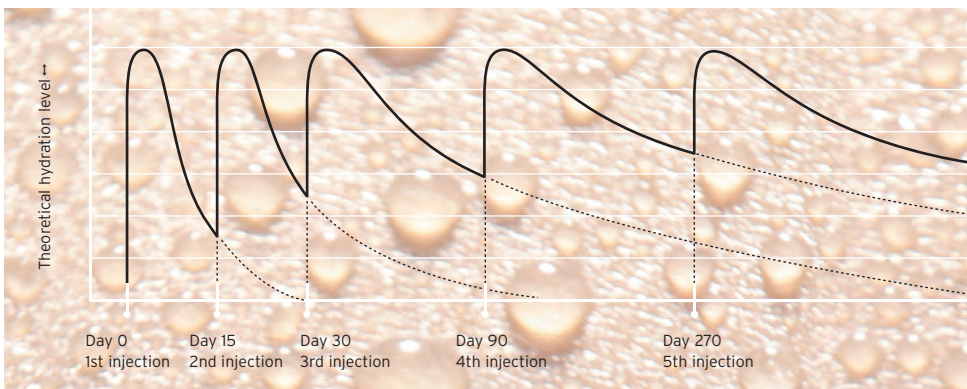
- their delivery in a pre-filled, sterile and ready-to-use syringe
- its glass syringe that offers a shelf life of 2 years
- storage that is possible at room temperature (< 30°C).

THE COMBINATION OF HA AND GLYCEROL:
1+1= A VERY NATURAL TREATMENT FOR MAXIMUM SAFETY

4. A RECOGNIZED PROTOCOL AND AN ERGONOMIC READY-TO-USE SYRINGE FOR LONG-LASTING EFFECTS AND COMFORTABLE INJECTIONS

A standard protocol, recognized by professional aesthetics circles, exists. It contributes to obtaining longer-lasting results for patients whose needs involve a long-term treatment.

Theoretical hydration curve during a Mesolis treatment



This protocol can nevertheless be revised depending on your patients' objectives:

- reconquest, for tired and dried-out dermis, of all its radiance, tone and elasticity
- prevention of wrinkles
- smoothing away of fine lines, as a complement to a wrinkle-filling treatment
- preparation of the dermis with a view to a wrinkle-filling treatment in order to prolong the results
- a "flash" radiance effect the day before an important social event
- correction of the consequences of periodic hormonal imbalances (pregnancy, menopause)
- compensation for the effects linked to aggressive aesthetic treatments: micro-dermabrasion, chemical peeling...
- decrease in the fatty mass contained in the dermis (cellulite)...

An ergonomic "ready-to-use" syringe for even more comfortable injections

Supplied in an ergonomically designed glass syringe, pre-filled and sterile, Mesolis and Mesolis+ are practical and easy to use: no assembly or device preparation is required. You simply disinfect the area to be treated and inject the solution that comes from the Mesolis range "all-in-one" syringes.

THE COMBINATION OF AN ERGONOMIC SYRINGE AND AN ADAPTED PROTOCOL: 1+1= HIGH-QUALITY TREATMENTS AND PATIENTS' LONG-LASTING SATISFACTION AND LOYALTY

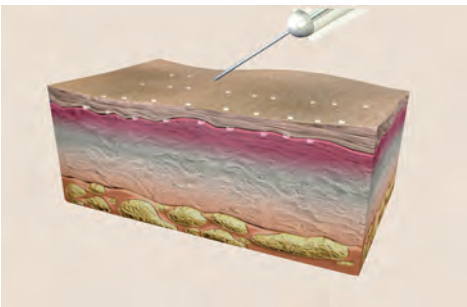
A FEW WORDS ON REJUVENATION TREATMENT TECHNIQUES

Rejuvenation treatments by micro-injections are inspired by the well-known principle of meso-therapy injections. In treatments aiming at rejuvenating the dermis, two techniques are used: the multi-puncture technique (or nappage technique) and the micro-papular technique.

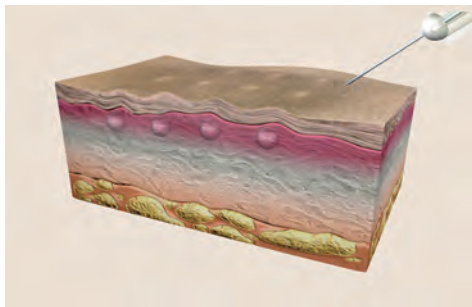
As the HA used in the manufacturing of Mesolis and Mesolis+ is non-cross-linked, it is possible to use these gels with the multi-puncture (nappage) technique in the dermal-epidermal junction.

| Technique | Multi-puncture | Micro-papular |
|-------------------------|-------------------------------------|---------------------------------|
| Needle's bevel pointed | Upwards | Downwards |
| Movements | Very rapid | Slow and precise |
| Injection Points | Numerous, not ordered | Regularly spaced (grid pattern) |
| At each injection point | - | A tiny papule |
| Injecting Level | Dermal-epidermal junction | Superficial dermis |
| Technique perfect for | Young /not severely dehydrated skin | Mature/severely dehydrated skin |

Multi-puncture technique



Micro-papular technique



The Anteis InjectNow Academy combining technique and technology

Anteis has created its own academy for plastic surgeons, dermatologists and aesthetic practitioners: the InjectNow Academy.

• injectnow academy

The InjectNow Academy makes available to practitioners complete information supports on these injection techniques and regularly organizes seminars that present injection protocols.

For more detailed information on the programs offered and the dates of the next sessions, visit our website: www.injectnow.com

THE MESOLIS RANGE - THE UNIQUE SOLUTION FOR A HIGHLY EFFECTIVE REJUVENATING TREATMENT

Face · Recovery of skin elasticity and firmness after 2 Mesolis+ sessions



Neck · Recovery of skin tone and elasticity after 3 Mesolis+ sessions



Décolleté · Fewer fine lines, more hydrated and brighter skin after 2 Mesolis+ sessions



Back of hands · Improvement of skin texture and radiance after 2 Mesolis+ sessions



By courtesy of Dr Lampignani, Milan, Italy

WHAT PRACTITIONERS SAY ABOUT MESOLIS+ AND MESOLIS

"...What I appreciate in the Mesolis range is the possibility of choosing between two products to compensate for different effects according to the type of the skin. And my favourite is definitely Mesolis+ to correct cutaneous aging..."

Dr Patrick Micheels, Geneva, Switzerland

"...Mesolis+ is perfect to compensate for the effects of prolonged sun exposure. It really gives my patients' skin back elasticity and tone. Smokers who have quite "tired" skin recover a radiance they haven't had for years..."

Dr Katarzyna Kwarecka Zajac, Warsaw, Poland

"I was told I could use Mesolis+ on a sensitive and dried skin, possibly resulting after micro-dermabrasion treatment, to give back hydration to the skin. It's absolutely true!"

Dr Bhertha Miyuki Tamura, Sao Paulo, Brazil

"...For women who want to benefit from a "flash" radiance heightener (before a dinner or a cocktail party), Mesolis+ is my favourite. I recommend Mesolis for younger and less dehydrated skin that has lost its tone or goes through a one-time dehydration period..."

Dr Ildiko Papp, Budapest, Hungary

"...Two products to adapt the right concentration and composition to the real needs of my patients... That's quite a brilliant answer to my expectations in terms of rejuvenation solutions! Because no patient has the same type of skin or requires the same approach to compensate for aging or hormonal imbalances, smoking or sun exposure effects..."

Dr Natalja Portnova, Riga, Latvia

"...For dermis rehydration? I certainly vote for Mesolis+. It's been my most positive experience for rejuvenation treatments these last 20 years..."

Dr Anne Grand Vincent, Paris, France

"...What radiance! This is just what I hear on a daily basis while finalizing a rejuvenation treatment with Mesolis+. And this expression of patient satisfaction is certainly the most pleasant compliment I can receive..."

Dr Sabine Béchaux, Thonon-les-bains, France

MESOLIS RANGE: TWO FORMULATIONS IDEALLY ADAPTED TO YOUR PATIENT'S SKIN

MESOLIS+



CE
0120

- Non cross-linked HA, Glycerol
- Concentration in HA: 18 mg/ml
- Volume of 1 ml/syringe
- Box of 1 or 3 syringes
- 2 x 30G 1/2 needles

Recommended injection level:

- Superficial dermis
- Dermal-epidermal junction

Adapted injection techniques:

- Multi-puncture (nappage)
- Micro-papular

Indications sites:

- Face, neck, cleavage (décolleté), back of the hands

Detailed indications:

- Rehydration of "tired" dermis
- Rehydration of dehydrated and "crumpled" dermis
- Skin elasticity, tone and radiance recovery
- Hormonal imbalances effects on the quality of the skin
- "Flash" radiance heightener
- Wrinkles prevention
- Smoothing of fine lines
- Preparation of the skin before filler injections
- Cellulite treatment

MESOLIS



CE
0120

- Non cross-linked HA
- Concentration in HA: 14 mg/ml
- Volume of 1 ml/syringe
- Box of 1 or 3 syringes
- 2 x 30G 1/2 needles

Recommended injection level:

- Superficial dermis
- Dermal-epidermal junction

Adapted injection techniques:

- Multi-puncture (nappage)
- Micro-papular

Indications sites:

- Face, neck, cleavage (décolleté), back of the hands

Detailed indications:

- Rehydration of "tired" dermis
- Skin elasticity, tone and radiance recovery
- Smoothing of fine lines
- Preparation of the skin before filler injections
- Cellulite treatment



THE ANTEIS AESTHETICS RANGES COMPLEMENTARY SOLUTIONS FOR ALL AESTHETIC TREATMENTS



FORTÉLIS · MODELLING

Correcting folds and face's contours

Fortélis makes it possible to carry out, through injections in the deep dermis, specific work on filling folds and severe cutaneous depressions of the face, increasing lip volume and modelling facial reliefs and contours.



ESTHÉLIS · FILLING

Smoothing wrinkles and lines

The unique rheological properties of the Esthélis gels authorize injections in the mid- to even the most superficial dermis, correcting fine lines, medium to deep wrinkles and scars, and enhancing lip volume.



MESOLIS · REHYDRATING

Restoring the skin's elasticity and radiance

The Mesolis range, composed of two gels devoted to rehydrating the dermis through superficial cutaneous micro-injections, is an ideal complement to the range of Anteïs fillers for skin firmness, complexion improvement and wrinkle prevention.

ANTEIS SWISS ENTERPRISE AND PRECISION

Anteïs comprises three divisions: Aesthetics, Ophthalmology and Orthopaedics

With its head offices based in Geneva, Switzerland, Anteïs relies on an expert team in the field of biopolymer transformation. With the company's EN 13485 ISO certification and the CE marking of the Esthélis, Fortélis and Mesolis ranges, Anteïs has demonstrated the undeniable know-how and great expertise of its "Swiss precision" team.

Questions? Comments? Complementary scientific information?

Contact your Anteïs representative or visit: www.mesolis.com



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