



Vegetal Placenta

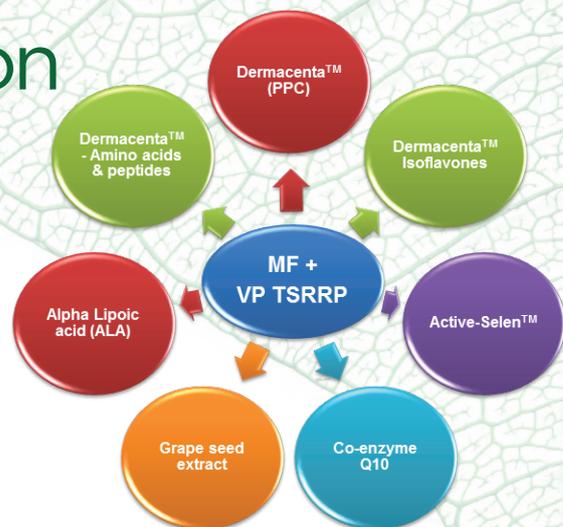
Total Skin Rejuvenation and Revitalisation

Vegetal Placenta for complete rejuvenation, restoration and repair

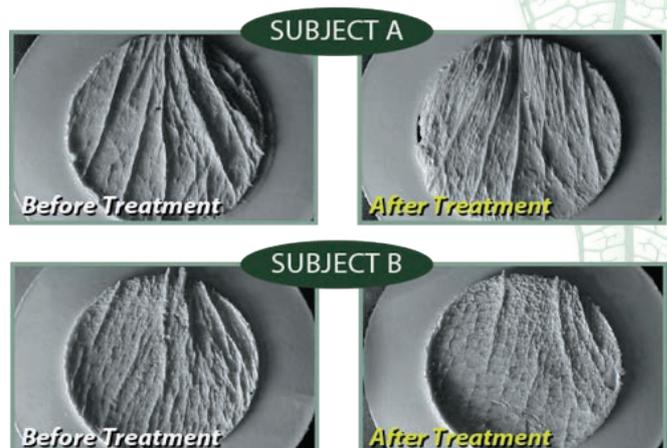
The placenta is a structure which connects between the mother's body and the fetus and facilitates the exchange of gases and nutrients in mammals. As for plants, the placenta is a specialized region within an ovary to which the ovules are attached to. The placenta of the plant is produced in the heart of their young buds which functions in nourishing the fruit of the plant during its growing stage.

Dermacenta™ (scientific code 511573), a proprietary ingredient extracted from the buds of a rare non-GMO (non-genetically modified) soybean plant, originated from France were noted to offer vast bioactive components and beneficial nutrients similar to human or animal placenta (Figure 1). The yeast cells are naturally extracted via the cold extraction Celluxinis™ proteolytic enzyme extraction technology, does not involve and heating thus maintaining its cellular structural walls and DNA cellular components. This method could extract all ingredients in its purest and native form thus retaining all the natural nutrients, amino acids, peptides, polyenylphosphatidycholine, growth factors and bioactive components.

Dermacenta™ offers the most unique ingredient – polyenylphosphatidycholine, vital for cellular structural, functional integrity, cell membrane function in the human body. They are also rich in nutrients, amino acids and peptides which enhance protein synthesis to maintain skin youthfulness, cellular revival and skin whitening effect which offers a substitution to animal or human placenta as they offer same efficacy and results.



Active components of MF Plus VP TSRRP AF2



Imprinted silicone showing MF Plus Vegetal Placenta Total Skin Rejuvenation & Revitalisation Programme Advanced Formula 2 before/after 3 weeks

Anti-ageing properties of MF Plus VP TSRRP AF2 resulting in total rejuvenated, regenerated, radiant and youthful skin

Aesthetics

- General skin rejuvenation and anti-aging
- Skin whitening
- Stimulate and regeneration of fibroblast skin cells
- Accelerates cell growth
- Protect against photo-aging and chronological aging
- Reduce skin pigmentation
- Reduce wrinkles

Therapeutics

- Prevent oxidative damage
- Provide photoprotection
- Wound healing
- Reduce inflammation
- Restore vitality
- Detoxify harmful foreign compounds and carcinogens
- Fortify and strengthen the immune system

Our Main ingredients

Dermacenta™

- Polyenylphosphatidylcholine (PPC)

PPC contain various functions such as cellular differentiation, cellular proliferation, cellular regeneration, cell signaling, cellular membrane fluidity and integrity, intracellular and extracellular molecules transportation through cellular membranes. PPC also play a role in emulsifying fat in the gastrointestinal tract, improves oxygen supply to cells in the body and enhance protein synthesis in the skin¹.

Dermacenta™ - Amino acids and peptides

Dermacenta™ are rich in non-essential or naturally occurring amino acids and also essential amino acids, which cannot be synthesized de novo by the human body. They play an important role in wrinkle reduction, increase fibroblast and collagen production, improves skin tone and dullness, decrease skin pigmentation, thus reducing the signs of skin ageing by providing the skin whitening and brightening effect. Types of essential Dermacenta™ amino acids include arginine, leucine, lysine, valine, methionine, threonine and non-essential amino acids alanine, glutamic acid, proline and serine act as free radical scavengers with anti-oxidant activities^{2,3}.

Dermacenta™ – Isoflavones

Dermacenta™ isoflavones are biological active compounds which include genistein, daidzin and glycitein. One of the main functions of isoflavones is to inhibit oxidative damage caused by UV exposure thus providing photoprotection. Besides, they also contain beneficial effects on skin and skin cells by improving skin elasticity, wrinkles reduction, maintenance of the extracellular matrix and inhibition of the ultraviolet light induced signaling that leads to photo-aging. Combination of these isoflavones, amino acids and peptides provide whitening effects and anti-melasma properties^{4,5}.

Active-Selen™

Selenium contains diverse physiological functions ranging from anti-oxidant, anti-inflammatory, immune system enhancement, thyroid hormone metabolism and cancer prevention. They are present as a part of thioredoxin reductase and glutathione peroxidase which prevent cellular damage against oxidative stress and protection from UV-induced free radical damage⁶.

Alpha Lipoic acid (ALA)

Alpha lipoic acid is present in mitochondria in all types of cells which are responsible in ATP formation. ALA exhibits potent antioxidant and anti-ageing activity as it has the ability to regenerate or recycle itself to continue to destroy free radicals and prevent oxidative stress damage. They could effectively reduce facial lines caused by photo-ageing, modulate signal transduction and a promising therapeutic agent against cancer^{7,8}.

Grape seed extract

Grape seed extracts are commonly consumed as a health or dietary supplement as they contained vast pharmacological actions ranging from anti-oxidant, anti-cancer, anti-microbial, anti-inflammatory activities and the protection of the liver. They also contain chemoprotective properties against free radicals and prevent against oxidative stress⁹.

Co-enzyme Q10

Co-enzyme Q10, also known as ubiquinone or ubidecarenone, contain high anti-oxidant activity and could prevent against oxidative stress. Its key role is the synthesis of ATP and for cellular function. It is an essential electron carrier in the mitochondria respiratory chain and highly present in the mitochondria. They could effectively provide photoprotection, hydrate skin and are widely used for anti-ageing therapy¹⁰.

Source:

¹ Gundermann, K. J., Kuenker, A., Kuntz, E. & Drodźik, M. (2011). Activity of essential phospholipids (EPL) from soybean in liver diseases. *Pharmacological Reports*. 63: 643-659.

² Goldflus, F., Ceccantini, M. & Santos, W. (2006). Amino acid content of soybean samples collected in different Brazilian states – Harvest 2003-2004. *Brazilian Journal of Poultry Science*. 8: 105-111.

³ Chae, G. Y. & Ha, B. J. (2011). The comparative evaluation of fermented and non-fermented soybean extract on antioxidation and whitening. *Toxicological Research*. 205-209.

⁴ Leyden, J. & Wallo, W. (2011). The mechanism of action and clinical benefits of soy for the treatment of hyperpigmentation. *International Journal of Dermatology*. 470-478.

⁵ Kang, S., Chung, J. H., Lee, J. H., Fisher, G. J., Wan, Y. S., Duell, E. A. & Voorhees, J. J. (2003). Topical n-acetyl cysteine and genistein prevent ultraviolet-light-induced signaling that leads to photoaging in human skin in vivo. *Journal of Investigative Dermatology*. 120: 835-841.

⁶ Richelle, M., Sabatier, M., Steiling, H. & Williamson, G. (2006). Skin bioavailability of dietary vitamin E, carotenoids, polyphenols, vitamin C, zinc and selenium. *The British Journal of Nutrition*. 96: 227-238.

⁷ Sherif, S., Bendas, E. R. & Badawy, S. (2014). The clinical efficacy of cosmeceutical application of liquid crystalline nanostructured dispersions of alpha lipoic acid as anti-wrinkle. *European Journal of Pharmaceutics and Biopharmaceutics*. 86: 251-259.

⁸ Jeon, M. J., Kim, W. G., Lim, S., Choi, H. J., Sim, S., Kim, T. Y., Shong, Y. K., Kim, W. B. (2016). Alpha lipoic acid inhibits proliferation and epithelial mesenchymal transition of thyroid cancer cells. *Molecular and Cellular Endocrinology*. 419: 113-123.

⁹ Nowsheri, J. A., Bhat, Z. A. & Shah, M. Y. (2015). Blessings in disguise: Bio-functional benefits of grape seed extracts. *Food Research International*. 77: 333-348.

¹⁰ Pegoraro, N. S., Barbieri, A. V., Camponogara, C., Mattiazzi, J., Brum, E. S., Marchiori, M. C. L., Oliveira, S. M. & Cruz, L. (2017). Nanoencapsulation of coenzyme Q10 and vitamin E acetate protects against UVB radiation-induced skin injury in mice. *Colloids and Surfaces B: Biointerfaces*. 150: 32-40.



Application

MF Plus and MF3 vegetal placenta series are suitable for all ages, sex and skin types. These products provide aesthetic rejuvenation derived from botanicals to gain a vibrant and beautiful skin.



Vegetal Placenta Extracts Substitute Animal Placenta Extracts.
International Electronic Journal on Dermopharmacological Research, Dermopharmaceutical Technology and Related Cosmetic Subjects.

