

Pigmentation Disorders

Pigmentation disorders usually manifest as patchy skin discoloration with irregular borders mainly affecting face, neck, décolletage and hands.

About

Melasma (or *Chloasma* when present during pregnancy) is one of the most common pigmentation disorders.

It presents as patches of skin discoloration developing gradually over time. Most often it manifests as changes in the colour of pigmentation of the face mainly affecting cheeks, forehead and nose. Melasma can cause sufferers psychoemotional distress and interfere with normal social interaction as people may feel self-conscious of their uneven skin tone.

The skin disorder affects primarily women and all skin types can be affected but melasma is more common in darker skin complexions.

Various factors have been associated with melasma. Some of them include:

- Genetic predisposition
- Hormonal causes such as pregnancy, contraceptives, stimulation for I.V.F.
- Exposure to sun can trigger or may act as an aggravating factor for melasma.
- Post Inflammatory Hyperpigmentation (PIH) secondary to ordinary conditions such as acne or injury to the skin resulting from sunburns, surgery or cosmetic procedures such as chemical peels, dermabrasion, lasers and cryotherapy (liquid nitrogen treatments).
- Thyroid and Addison's disease.

- Other aggravating factors include certain cosmetic products e.g. exfoliating lotions and bleaching agents especially when used without sun protection, a wide range of medication such as corticosteroids, systemic retinoids or other systemic photosensitizing drugs such as certain antibiotics.

Skin colouring

Melanin, apart from being an excellent photoprotectant, is also the primary determinant of skin colour. There are two types of melanin; *eumelanin* and *pheomelanin*. The enzyme tyrosinase is required for melanocytes to produce melanin from the amino acid tyrosine.

Indications

Dr Sotirios Foutsizoglou has been using over a number of years the **Dermamelan Depigmentation Treatment** by *Mesoestetic* with very good results indeed. Dermamelan is a safe treatment for all skin phototypes (Fitzpatrick I – VI, see table) and it can be used for a variety of skin blemishes including

- Melasma (all types)
- Freckles
- Solar lentigo (eg, actinic lentigo, senile lentigo, sun spot, liver spot)
- Juvenile lentigo
- Post-inflammatory hyperpigmentation

- Idiopathic hyperpigmentation

Dermamelan can also help in hypomelanoses such as pielbadism, vitiligo and pityriasis alba causing a more even distribution of the remaining pigment.

Dermamelan is a well tolerated non-hydroquinone depigmentation treatment which acts as a reversible tyrosinase inhibitor without damaging the melanocytes; that means less likely to cause post treatment patchy hypopigmentation.

Dermamelan's active depigmenting ingredients are Kojic Acid, Phytic Acid, Alpha Arbutin and Azelaic Acid .

Dermamelan combines alpha and beta hydroxy acids, that help with the excess melanin elimination, with a vitamin complex (e.g. Vitamin C and E) and sunblock filters (e.g. avobenzone) providing a very effective antioxidant protection. It also stimulates collagen production and cell renewal enhancing skin luminosity.

If you are interested in knowing more about **Dermamelan** and **other depigmentation treatments** contact us today to book your free consultation.

Treatment Explained

Dermamelan can be used in any time of the year provided that a high SPF sunscreen is applied during the day for optimal results.

There is no special preparation for **Dermamelan**. However patients must have not used topical or oral steroids, retinoids or other photosensitizing medication such as certain antibiotics within the previous 3 months. **Dermamelan** should not be used in conjunction with other ablative modalities such as lasers, microdermabrasion, other bleaching agents or TCA peels.

Dermamelan is performed in 2 stages:

Stage 1

- **Dermamelan** should be used by experienced healthcare professionals who can make an accurate diagnosis of the patient's skin problem. For instance there are a number of skin conditions that mimic melasma or pigmentation disorders such as Riehl melanosis, Poikiloderma of Civatte, drug-induced pigmentation, inflammatory diseases (e.g. lupus erythematosus, atopic dermatitis), skin cancer, etc. Therefore a correct diagnosis is of paramount importance.
- For *mild hyperpigmentation* the **Dermamelan degreasing solution** (included in the Dermamelan pack) is applied as skin prepping to aid ingredient penetration. For *moderate to severe* hyperpigmentation Dr S. Foutsizoglou also uses **50% Mandelic Acid** which has both keratolytic and whitening properties enhancing the action of the **Dermamelan's** active ingredients.
- Finally the **Dermamelan Mask**, with the active ingredients, is applied and advised to be left on the face for
- 8 hours for phototypes I –II (Pale skins)
- 10 hours for phototypes III–IV (Mediterranean type of skin)
- 12 hours for phototypes V-VI (Asian and Black skin)

If used in other parts of the body shorter duration of application is normally required.

Stage 2

- On completion of application time the patient can remove the mask with soap and water.
- Maintenance is achieved by using the **Dermamelan Treatment** cream for up to nine months depending on the severity of your skin problem.

- Application of the **Dermamelan Treatment** cream is recommended for 3 times a day for the 1st month; twice a day for 2nd and 3rd months; and once at night time thereafter.

In severe cases stages 1 and 2 can be repeated in 15 days time.

For localised hyperpigmentation:

Mesoesthetic Melanogel Touch can be applied twice a day directly onto the skin blemishes in order to accelerate the lightening process.

Other Depigmentation treatments offered by **SFMedica** include:

- The **Obagi Nu-Derm System** which uses a unique combination of active and prescription-strength ingredients such as *Tretinoin* and *Hydroquinone 4%*. It is proven to be effective against pigmentation disorders, in particular, when combined with the **Obagi Blue Peel**.
- The **Aestheticare MelaClear** is a cost-effective depigmentation treatment that consists of the **Intense Depigmenting Care Serum**, **Depigmenting Maintenance Cream** and **MelaClear Sunscreen SPF 50+**.
- **Chemical peels** are indicated for sun-damaged skin, pigmentation spots, melasma, chloasma, post inflammatory pigmentation, superficial skin blemishes, etc

Aftercare

According to **Dr S. Foutsizoglou's** clinical experience **Dermamelan** can reduce up to 100% of abnormal skin pigmentation, particularly in epidermal melasma. Patients can usually see a significant improvement within the first two weeks. However people need to be warned that it will take time until results become permanent due to the rebound effect and complexity of skin blemishes (see table). In severe cases of melasma, such as dermal or mixed melasma, maintenance treatment should be continued for up to 9 months and very

occasionally up to 1 year. This will be discussed during your first consultation.

In addition to **Dermamelan Treatment** cream, used as part of the maintenance protocol, patients are also advised to use:

- **Vitamin C 20%** twice a week on face and neck.
- **Mesoesthetic Hydra-Vital Factor K** for normal and young skins or **Mesoesthetic Regenerance Active** cream for oily or mature skins
- For sensitive skins **Mesoesthetic Anti-stress Face** mask is recommended to apply once a week for skin soothing and decongestion
- The use of a sunscreen such as **Mesoesthetic Complete Moisturizing Sunblock** or **Mesoesthetic Dermatological Complete Sunblock** is absolutely necessary especially if treatment is carried out during spring or summer.

For more information on pigmentation disorders and their treatments please download **Dr S. Foutsizoglou's** relevant article.

Tables

| The Fitzpatrick phototype scale | | | |
|---------------------------------|---|----------------------|--|
| Type | Phototype | Sensitivity | Characteristics |
| Type I | Blond or red hair, freckles, fair skin, blue eyes | Very Sensitive | Always burns easily, never tans; very fair skin tone |
| Type II | Blond, fair skin, blue eyes or green eyes | Very Sensitive | Usually burns easily, tans with difficulty; fair skin tone |
| Type III | Darker Caucasian, Mediterranean | Sensitive | Burns moderately, tans gradually; fair to medium skin tone |
| Type IV | Darker Mediterranean, Asian, Hispanic | Moderately Sensitive | Rarely burns, always tans well; olive skin tone |
| Type V | Middle Eastern, Latin, light-skinned black, Asian | Minimally Sensitive | Very rarely burns, tans very easily; dark skin tone |
| Type VI | Dark-skinned black | Least Sensitive | Never burns, deeply pigmented; very dark skin tone |

| Classification of melasma according to its depth | |
|--|---|
| Type of Melasma | Clinical features |
| Epidermal | <ul style="list-style-type: none"> Well-defined border Dark brown colour Enhanced under Wood illumination Responds better to treatment |
| Dermal | <ul style="list-style-type: none"> Ill-defined border Light brown colour Remains unchanged under Wood's lamp Responds poorly to treatment |
| Mixed | <ul style="list-style-type: none"> Combination of light and brown patches Partial improvement with treatment Most common type |