

Pigmentary lesions

Last update on 2023

Where do the brown spots come from?

There are 2 kinds of brown spots:

1. **Localized spots called solar lentigos by doctors** and age spots by patients ... They generally appear after 40 years old on areas exposed to UV (face, back of the hands, neckline, forearms, front of legs ...) and are due to solar skin aging. They can appear earlier in people with light skin after a severe sunburn or after having done cabin sessions to sunbathe. They should be distinguished from other brown lesions that are medically dangerous and should therefore only be treated after careful dermatological examination, possibly with the help of a dermatoscope. In case of doubt before treatment, the dermatologist can perform a skin biopsy. These lesions should never be treated by non-physicians (be careful to beauty centers offering sessions of pulsed light to treat brown spots).
2. **"Masks" of diffuse brown spots of the face called melasma by doctors** and mask of pregnancy by patients (but sometimes appearing without any pregnancy, in man or woman). This is a chronic pathology of the pigment cells of the face and sometimes the arms. The problem is complex, multifactorial and sometimes runs in families. The patient is told that, for at least 10-15 years, his pigment cells have become "hypersensitive" to certain rays of the sun (the so-called "visible" part of the solar spectrum, particularly in the blue). The dermatologist can't "cure" this "natural" or "basic" tendency, but he can help you to manage it as effectively as possible. Draconian sun protection is essential all year round, with specific screens that cut out visible light and not just "sunburn". Cosmetic depigmenting treatments are the basis of long-term management.

Lasers and medical pulsed lights for solar lentigos:

They have been widely proven for the treatment of multiple spots of the face, hands and body. They are effective, quick, less painful and more selective than the old liquid nitrogen techniques. (Nitrogen or cryotherapy not only burns spots, but also healthy tissue; it's a non-selective treatment and can leave post-treatment scars that are too white). The selectivity of the devices is the crucial point: by targeting the melanin of the spots, they allow to erase the lesions without inducing any damage to the adjacent tissues, therefore without creating too great difference of color or texture compared to the untreated adjacent skin. The Q-switched or triggered pigment lasers also use very short pulse durations (nano or subnano-seconds) to avoid as much as possible the heat damage. Other lasers or lights can be used: alexandrite laser, medical pulsed lights especially if there are many spots in the same area.

The treatment is painless (sensations of tingling) and is performed without anesthesia. After the treatment, the spots become gray or at least darker in color, then become crusts and are gradually eliminated in a few days (all the more quickly if a thick layer of healing cream is carefully applied). A pink spot can persist for a few weeks and then the skin resumes its initial color.

Be careful, however, in patients with dark or mixed skin, a brown spot of post-inflammatory

pigmentation can replace the sunspot for a few weeks or months. Conversely, in subjects with very white, sensitive skin, redness may persist in the same way. These effects are almost always transitory. The dermatologist will explain it to you. The treatments are performed on a non-tanned skin, in autumn or in winter with a strict sun protection. With these precautions, pigmentary complications are rare and transient, exceptionally with scars. To avoid recurrences, you must protect yourself from the sun.

Test: It is not mandatory but it can be done on a representative area. It evaluates tolerance (good healing without pigment disorder) and effectiveness, and allows the doctor to refine the parameters.

The number of proposed sessions varies according to the location, the number of spots, the laser used and the type of the skin. Generally, 1 to 2 sessions of lasers for isolated spots and 1 to 3 sessions spaced 1 month apart for medical pulsed lights.

Lasers and medical pulsed lights for melasma:

Medical lasers and pulsed lights are not the first-line treatment for this problem, which can be aggravated by a laser due to a phenomenon of pigment "rebound". After a period of 3 to 4 months of depigmenting treatments and strict sun protection, if the spots persist, some protocols can be proposed but you have to be aware that they will not prevent a recurrence if the sun protection is not respected. Low-energy pigment lasers, non-ablative Er-Glass or Thulium fractional lasers, pulsed lights, pulsed dye lasers can be in some cases a useful help for a further lightening of spots, but they often require maintenance sessions.

This information sheet recommended by the French Laser Society can be given to you by your dermatologist. Even if it is not sufficient to have an estimate, it helps to give the patient a clear information.

The information consultation provides clear explanations on expected outcomes, side effects and possible complications. There are not any reimbursement from social security or medical leave for these aesthetic treatments. Prices are mainly based on the area to be treated. The total cost is to be evaluated with the patient and is the subject of a signed quote.

A post-operative order and an advice sheet are given to the patient with the doctor's contact information.