

## Finding Out the Cause of Hair Loss

Trial and error treatment is not the most effective remedy for hair loss. The most effective and successful treatment is based upon a correct diagnosis of the cause of hair loss. The fastest and surest way to obtain a correct diagnosis is to consult a trained and experienced physician hair restoration specialist.

Before recommending or undertaking a surgical hair restoration procedure or non-surgical hair restoration program, the physician hair restoration specialist will conduct a series of tests and examinations that will include at minimum (1) a medical history, (2) a physical examination, and (3) a scalp examination. If those examinations indicate that hair loss may be due to a condition other than male or female pattern hair loss, the physician will look for other causes. In men, the diagnosis of androgenetic alopecia is generally straightforward but in women, determining the exact cause of hair loss can be more complicated. In some cases an underlying condition such as hypothyroidism may have to be treated by the patient's primary care physician before hair restoration can be undertaken.

A scalp examination to determine the cause and progression of hair loss may include any of the following tests, depending on the physician's assessment of information needed:

- Hair pull—about 25 to 50 hairs are removed from the scalp by gentle pull. Normally, only a few hairs are removed with each pull; removal of larger numbers with each pull may indicate an abnormality of hair growth. Extracted hair shafts can be examined under a microscope to determine the condition of the hair shaft and bulb (the end of the hair shaft extracted from the follicle).
- Phototrichogram—hairs are clipped or shaved in a marked-out area of the scalp and consecutive photographs taken over three to five days to determine the rate and quality of hair growth.
- Hair window—hairs are clipped or shaved in a marked-out area of the scalp and hair growth is evaluated over a period of 30 days. Abnormalities

of hair growth cycling can indicate an underlying condition such as thyroid hormone imbalance, nutritional deficiency, drug side effect, or systemic illness as well as hair-specific conditions such as telogen effluvium.

- Scalp biopsy—usually performed only if the physician hair restoration specialist needs information that only a biopsy can provide—such as a condition affecting scalp hair follicles. Biopsy is not necessary for the great majority of patients evaluated for hair loss or hair restoration. Scalp biopsy performed for hair loss or hair restoration has no relationship to biopsies performed to diagnose cancer.
- Hair shaft evaluation—examination of the extracted hair shaft under a microscope can reveal hair shaft abnormalities and infections that may be responsible for hair breakage, shedding or unruliness.
- Hair analysis—a sophisticated laboratory test ordered by the physician hair restoration specialist to provide specific information such as (1) altered hair protein profile due to an inherited abnormality, or (2) drug or heavy metal contamination. Hair shaft analysis has no value for the diagnosis of systemic disease or nutritional status, contrary to claims by non-physician “hair analysis specialists”.

Most persons seeking hair restoration have male or female pattern hair loss—a condition simple to diagnose and readily treatable. Additional diagnostic tests are not usually necessary for these patients.