

## Telogen Effluvium

It is normal to lose up to about 100 hairs a day on one's comb, brush, in the sink or on the pillow. This is the result of the normal hair growth cycle. Hairs will grow for a few years, then rest for a few months, shed, and regrow. Telogen is the name for the resting stage of the hair growth cycle. A Telogen effluvium is when some stress causes hair roots to be pushed prematurely into the resting state. Telogen effluvium can be acute or chronic.

If there is some "shock to the system", as many as 70% of the scalp hairs are then shed in large numbers about 2 months after the "shock". This sudden increase in hair loss, usually described as the hair coming out in handfuls, is acute telogen effluvium. This is a different problem than gradual hair thinning. However, this can be seen in the less common Chronic Telogen Effluvium, only after a significant amount of hair has already been lost.

A considerable number of different causes for Telogen Effluvium exist. Among the common causes are high fevers, childbirth, severe infections, severe chronic illness, severe psychological stress, major surgery or illnesses, over or under active thyroid gland, crash diets with inadequate protein, and a variety of medications. Most hair loss from medications is this type and causes include retinoids, beta blockers, calcium channel blockers, antidepressants, and NSAIDS (including ibuprofen).

Typically, abrupt diffuse hair loss is noticed several weeks to several months after the incident has initiated the biologic program for hair loss. While the most often noticed hair loss occurs on the scalp, some individuals may also notice hair loss elsewhere on the body. Significant hair shedding usually occurs when shampooing, combing, or even when gently manipulating the hair. Shedding usually slowly decreases over 6 to 8 months once the cause for the hair loss is no longer present. As some of the causes represent ongoing problems, it is important to determine the likely cause when possible and take appropriate measures to prevent continued hair loss.

These shed or loose hairs all have club-shaped "roots" typical of resting, telogen hairs and may be easily identified under the microscope. After shampooing, the bulk of existing loose hair has often been shed and loose hair may not again appear until additional hairs enter this resting phase. When there is any doubt about the presence of this condition, a small piece of skin may be taken from the scalp as a biopsy to be examined under the microscope. In this way, the condition of the hair follicles, the tissues that produce the hair, may be determined.

No treatment is needed for most cases of Telogen Effluvium. Remember that the hairs fall out when a new hair growing beneath it pushes it out. Thus with this type of hair loss, hair falling out is a sign of hair regrowth.

As the new hair first comes up through the scalp and pushes out the dead hair a fine fringe of new hair is often evident along the forehead hairline.

The most important issue in Telogen Effluvium is to determine if an underlying cause for the problem is present. Blood tests may need to be done if the cause is not obvious, such as mild iron deficiency. If the Telogen Effluvium is caused by a medication, the medication needs to be stopped. When the cause of the hair loss is something like giving birth, a transient illness, or other self-limited problem the induced Telogen Effluvium is also usually self-limited and requires no treatment.

Chronic telogen effluvium is recently recognized and not uncommon. It often occurs in women who previously had very thick hair in their teens and twenties and still have an apparently normal head of hair to a casual observer. It affects the entire scalp with no obvious cause apparent. It usually affects women of 30 to 60 years of age, starts suddenly and has a tendency to fluctuate for a period of years. The degree of shedding is usually severe in the early stages and the hair may come out in handfuls. It does not cause complete baldness and does appear to be self-limiting in the long run.