

BIODROGA MD™

MEDIC SKIN CARE

HAIR CARE
WITH MEDICAL
COMPETENCE






THINNING HAIR:
30 MILLION WOMEN



HAIR LOSS=
DISTURBING,
EMOTIONAL
STRESS

LOSS OF SELF-
CONFIDENCE



A photograph of a man and a woman in a shower. The man is on the left, shirtless, looking towards the camera. The woman is on the right, also shirtless, with her hand on the man's head, possibly washing his hair. The background shows white shower doors. A semi-transparent white box is overlaid in the center, containing text.

THINNING HAIR:
AT THE AGE OF 50
85% OF MEN

A HUGE AMOUNT OF POTENTIAL CUSTOMERS

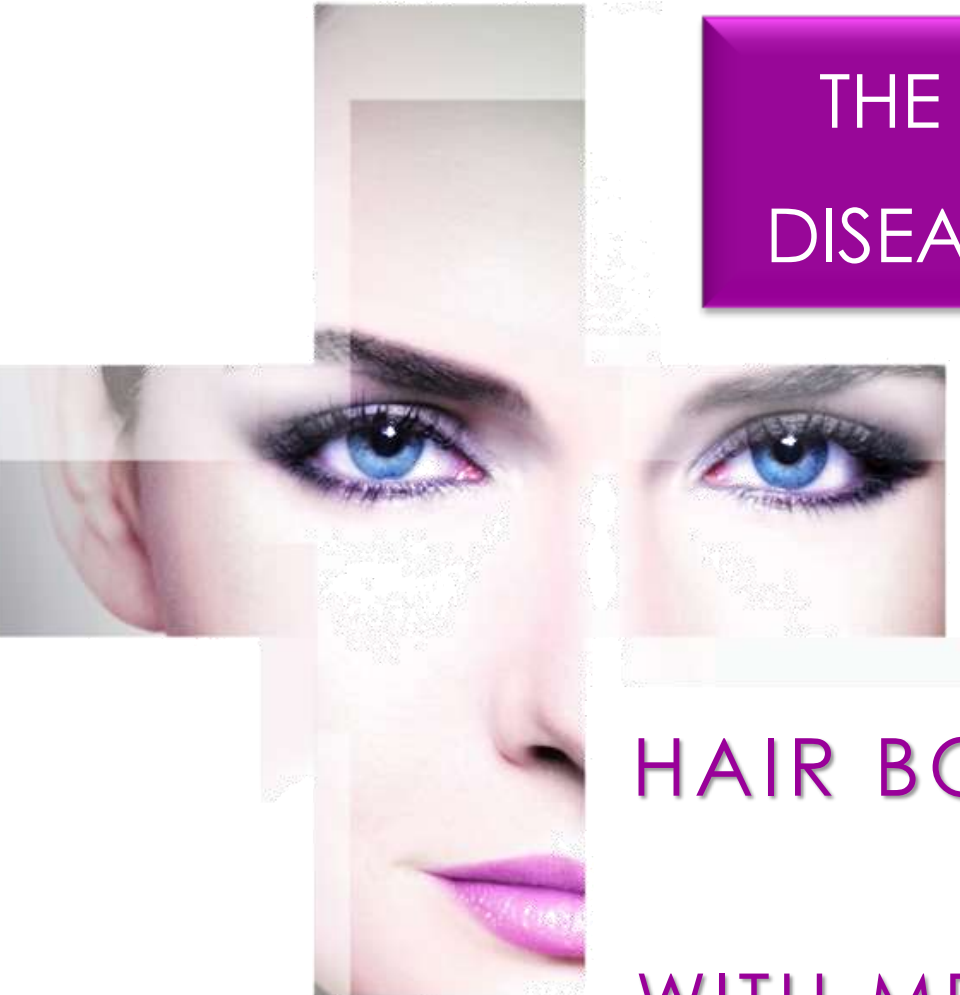
30 MILLION AMERICAN WOMEN HAVE THINNING HAIR

AT THE AGE OF 35
TWO THIRDS OF AMERICAN MEN WILL EXPERIENCE
A CERTAIN DEGREE OF NOTICEABLE HAIR LOSS

AT THE AGE OF 50
APPROXIMATELY 85% OF MEN HAVE SIGNIFICANTLY
THINNING HAIR.

BIODROGA MDTM

THE SOLUTION FOR NON-
DISEASE-RELATED HAIR LOSS



HAIR BOOSTER BY BIODROGA MD

HAIR CARE
WITH MEDICAL COMPETENCE

BIODROGA MDTM

DERMOCEUTICAL HAIR CARE

Interdisciplinary according to
the latest findings:

- DERMATOLOGY
- COSMETICS
- PHYTOPHARMACY
- BIOTECHNOLOGY

SPECIAL CARE
COMING CLOSER TO
MEDICINE

BIODROGA MDTM



THE ACTIVATION OF HAIR GROWTH

BIODROGA MD™
HAIR BOOSTER

SCALP CLEANSING
CONCENTRATE

ENERGIZING SERUM



BIODROGA MD™

THE FREQUENT CAUSE OF HAIR LOSS

- Is an **age-dependent**, **degenerative**, **immunological** and **inflammatory process**.
 - **Vitamine and nutrient deficiencies** are frequently associated, e.g. Vitamin D3 or Vitamin B.
 - More recently, scientific data demonstrate **changes in molecular pathways** that are essential for hair follicle formation and morphology.
- Specifically, hair follicle stem cells **lose their physiological regeneration potential**.
 - Proinflammatory Prostaglandin D2 and other mastcell-derived serinases **cause changes** in hair follicle functioning and consequently causing hair loss.

THE FREQUENT CAUSE OF HAIR LOSS

- The multifactorial underlying pathophysiology of hair loss is suggested to be mainly and essentially caused by lack or loss of certain signaling peptides.
- This leads to reduced self-renewal capacity of follicles and epithelium, recognized in reduced follicle-size, hair loss and inflammation of the scalp.

BIODROGA MD™ HAIR BOOSTER WITH NATURE-IDENTICAL PEPTIDES

Thymic peptides occur naturally in the body:

- They are formed in the **thymus gland** which controls the body's vital energy.
- The **triggering effect** of thymic peptides stimulates physiological processes that have an impact on the appearance of skin and hair.

PEPTIDES STPL II – THE KEY TO OUR IMMUNE SYSTEM

- Low-molecular, tetra-peptides are important signaling peptides for physiological functioning of cells and tissues (e.g. hair follicle, epidermis) as well as the immune system.
- There is an age-dependent decrease of such regulating signaling peptides.
- COPIED FROM NATURE: STPL II
- Synthesized from natural, plant derived amino acids.
- STPL2 is a synthetic, nature-identical tetra-peptide complex, which reconstitutes normal cell physiology and hair growth cycles.

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THE MAIN BENEFITS OF HAIR BOOSTER

1. Anti-hair-loss effect

Inflammatory mechanisms, including mast-cell activity (PG D2, serinases, tryptase) are inhibited.

4. Disinfection

Scalp and hairline are thoroughly cleansed.

2. Hair-growth stimulating

Follicle stem cells are activated.

5. Conditioning effect

Hair structure and quality are improved. The scalp is revitalized.

3. Phase shifting

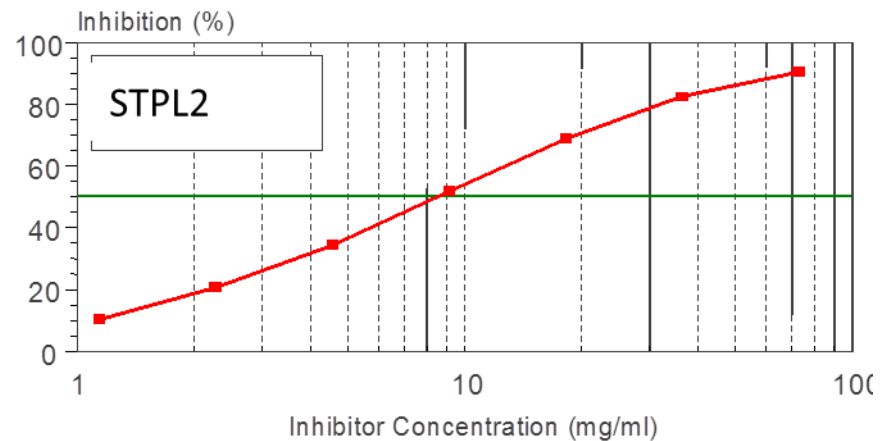
The anagen phase (growth phase) of the hair is prolonged.

6. Anti-dandruff effect

The epithelial functions of the scalp are improved.

1. Anti-hair-loss effect

Inflammatory mechanisms and mast-cell activity are inhibited.



STPL II normalizes the causes responsible for the loss hair follicle and the epithelial cell function.

- Inhibition of mast cells effects, e.g. serinases, trypase, PG D2, proinflammatory mediators
- Stimulation and activation of follicle-adjacent stem cells
- There is evidence that mast cells derived inflammatory mediators play an essential role in hair loss
- DHT-binding androgen receptors, a pathophysiological co-factor, are masked by free amino acids

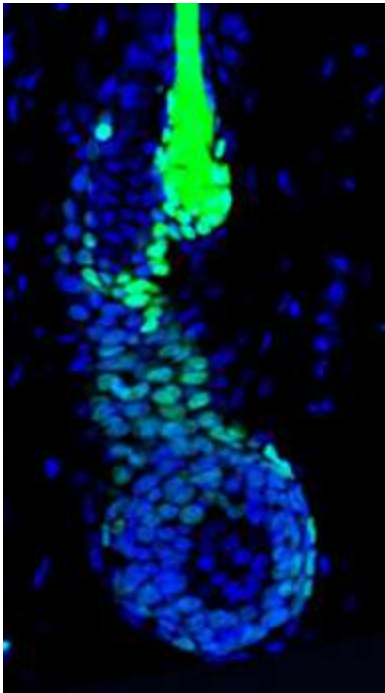
Mast cell produced PG D2, serine proteases, tryptase and trypsin are significantly inhibited by STPL2.

STPL2 signaling peptides modulate hair stem cell function.

2. Hair-growth stimulating

Follicle stem cells are activated

STPL II vitalizes the physiological function of the hair follicle.
New hair growth is stimulated.

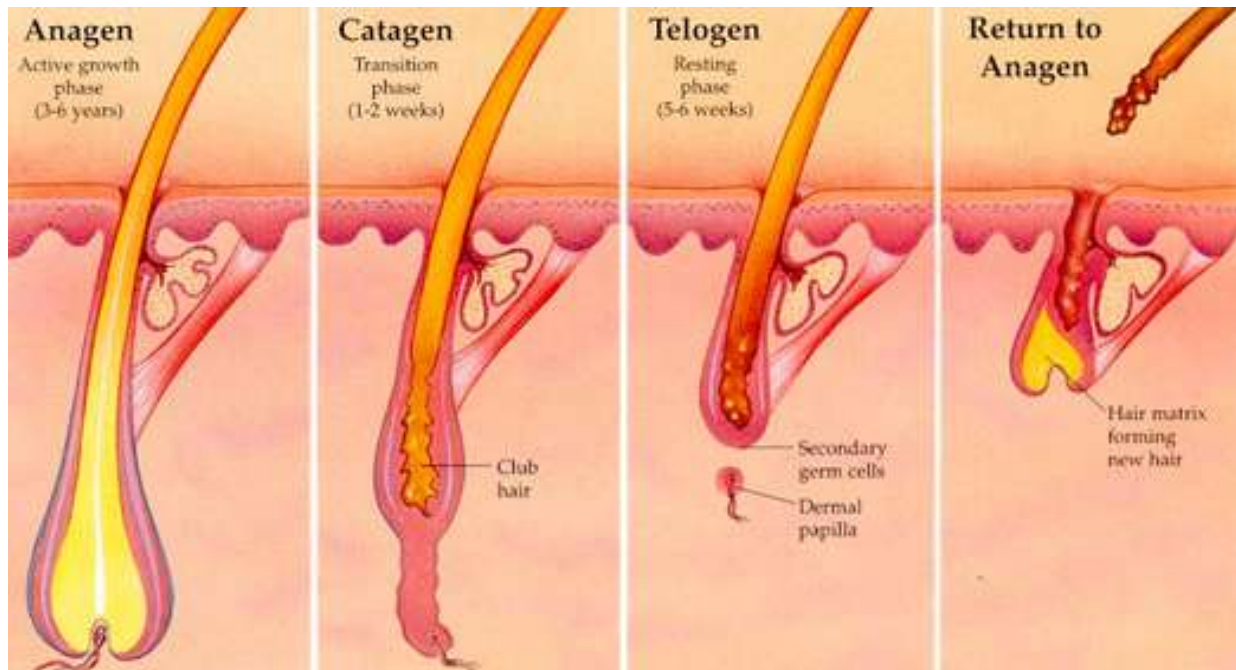


Since **the hair follicle undergoes cycles of degeneration and regeneration throughout life**, it has been assumed that hair follicle growth is controlled by stem cells. Currently, the best characterized hair follicle stem cell population is the **bulge stem cell** which resides in a discrete microenvironment called the bulge. **Bulge stem cells have the capacity to differentiate into all epithelial components of the hair follicle, and also participate in the repair of the skin.** The ability to stimulate human hair follicle bulge stem cells offers fascinating therapeutic potential for alopecia as well as for epithelial tissue regeneration.

3. Phase shifting

Due to the extension of the anagen phase (growth phase) of the hair the longevity of hair is prolonged.

PILOT STUDY OF THE DERMATOLOGICAL CLINIC IN DARMSTADT,



Extension of the anagen phase:

Front of head 40%

Back of head 43%

4. Disinfection

The influence of disturbing environmental factors may also be responsible for hair loss.

The Energizing Serum contains 30% alcohol. Alcohol has a disinfecting effect so that germs which have a negative influence on hair and scalp can be reduced.



5. Conditioning effect

The PEPTIDES STPL II improve the natural conditions for hair growth, they optimize the hair volume and strengthen its structure and texture. Caffeine improves the circulation of the scalp and protects the hair roots.

Vitamin E acetate builds up the hair structure and has an anti-oxidative effect against free radicals. Biotin improves the hair growth.

Panthenol provides the scalp with valuable moisture and has soothing properties.

Lecithin conditions hair and scalp. Black oat extract envelops the hair with an invisible, protecting film, cements damaged areas and protects hair against moisture loss.

Wheat protein provides for supple hair, giving it strength.

6. Anti-dandruff effect

The functions of the scalp are improved

- Dandruff frequently is a co-factor in hair loss
- It is characterized by dry skin, reduced epithelial vitality, inflammation leading to redness and pruritus (itching) – basically reduced epithelial cell biology (-specifically keratinocytes) and skin irritation
- Often associated with an epithelial scalp yeast infection and reduced epithelial cell metabolism
- STPL2 in its unique formulation counteracts all these factors and
- Disinfects the scalp
- Inhibits inflammation
- Vitalizes epithelial cells and
- Normalizes skin physiology

HAIR BOOSTER – THE APPLICATION

In combination

**Scalp Cleansing
Concentrate
&
Energizing Serum**

Important: For a visible effect, use at least 3 to 6 months daily.

*The effectiveness will
be optimized if
both products are used!*

*Approx. **45%** of the
peptides reach the hair
follicle.*

HAIR BOOSTER – TO USE

Dosage (on the entire scalp):

STEP 1

Shampoo Concentrate, 75ml – 2 months supply

Apply approx. 1,5ml Shampoo Concentrate (pump 2 times) with the finger tips to the scalp. Wash and massage in for 1 minute.

Rinse off thoroughly.

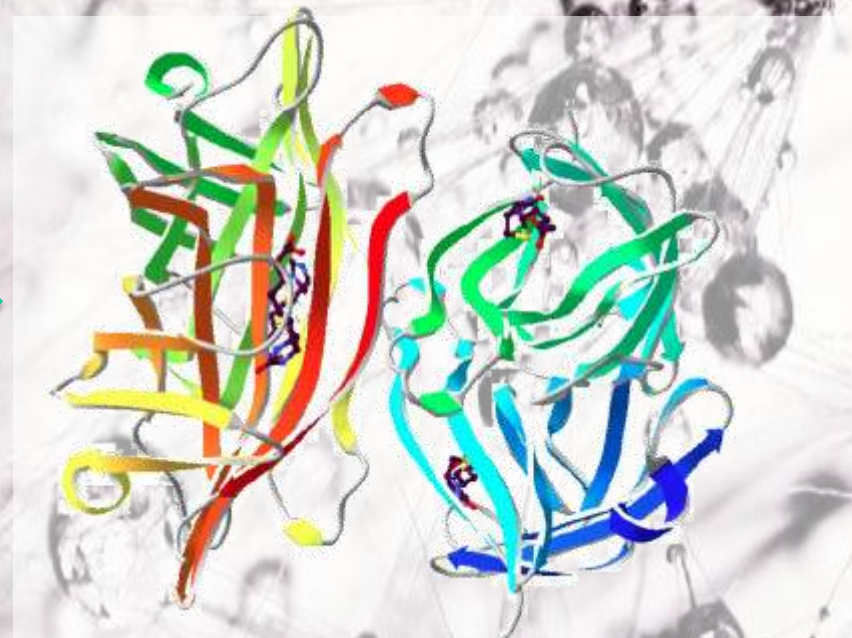
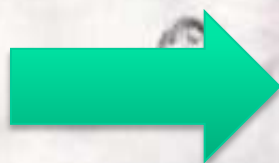
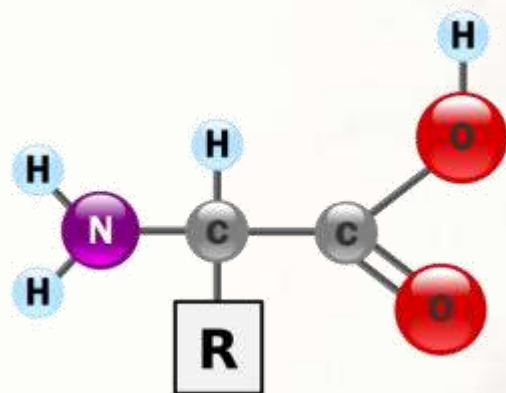
STEP 2

Energizing Serum, 100ml – 2 months supply

Apply 1,5 ml Energizing Serum (1 plunger action = approx 0,5ml) with the finger tips to the scalp and massage in thoroughly. Do not rinse. Then style as usual.

Adapt volume of Energizing Serum for local areas of hair loss.

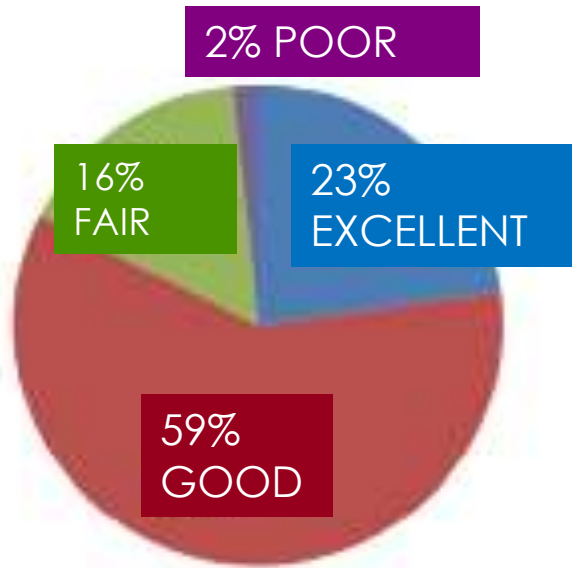
SCIENTIFIC PROOF OF STPL II



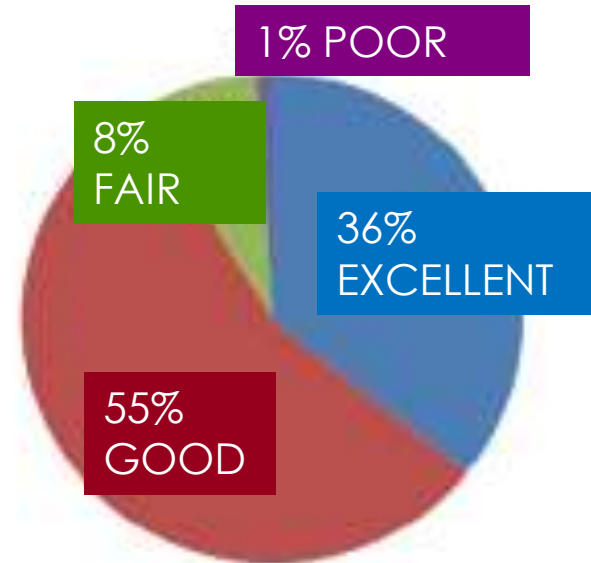
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Pull-test after 180 days of treatment: 4 levels of improvement

MEN



WOMEN



SCIENTIFIC PROOF OF STPL II

M- Barbareschi et al; 2011

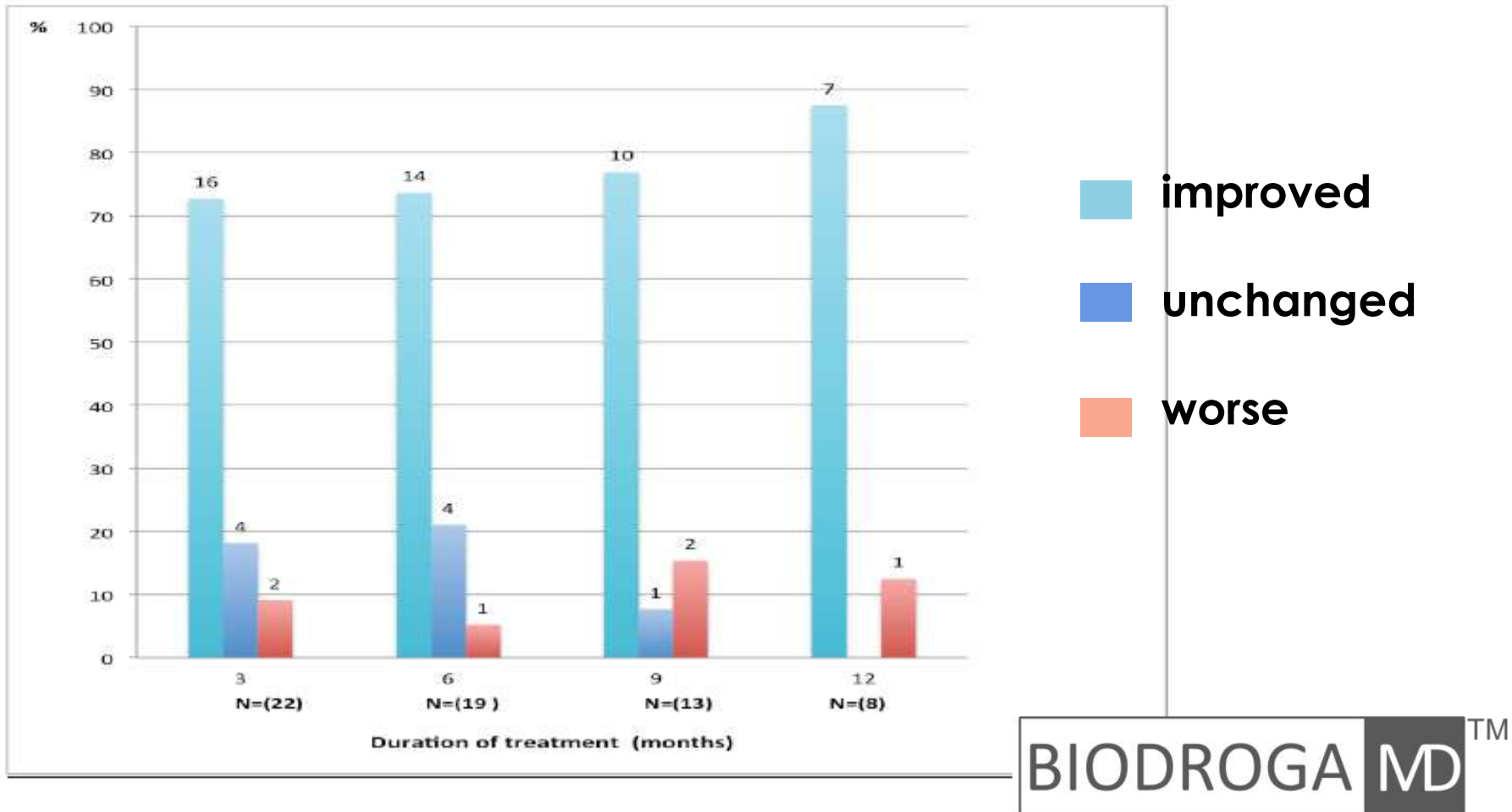
Six-month study with 337 test persons (male and female):

Pull test men with androgenetic hair loss: 95 % effectiveness

Pull test women androgenetic hair loss: 98 % effectiveness

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EFFECTIVENESS OF STPL II AFTER THERAPY TIME



SCIENTIFIC PROOF

STUDY IN CANCER PATIENTS DURING THE CHEMOTHERAPY

No or very little hair loss: 41-81 % of patients

JOURNAL OF PLASTIC DERMATOLOGY, 2009

6-month study, 115 women with telogen effluvium (average age: 40 years)

Pull-test 88% total effective

STPL II – COMPARATIVE TEST

Comparative test of the effectiveness of different ingredients:

THERAPEUTIC EFFECT AFTER 6 MONTHS

STPL2	73%(19/26)
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Spironolacton	33%(5/15)
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Cyproteronacetate	40%(4/10)
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Minoxidil	40%(4/10)
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EFFECTS OF TOPICAL TREATMENT WITH STPL II

Before and after 3 months of treatment



Before and after 6 months of treatment





COMPETITORS HAIR BOOSTER

BIODROGA MDTM

The concept

Products with caffeine complex (Plantur, Alpecin)

- counteract the negative effect of testosterone

Effect of testosterone:

- impedes the energy supply of the hair root
- shortens the active growth phase of the hair
- leads to increased hair loss



ALPECIN

The concept

Minoxidil (z.B. Rogaine):

- was originally used as a high blood pressure medication
- It is a nitric oxide agonist which dilates blood vessels and activates the enzyme Guanylate cyclase
- The expectation is that the blood circulation at the hair follicle would be improved

- Result: Stimulation of hair functions
- is mainly used at hereditary hair loss



MINOXIDIL

The concept

Nioxin

- Does not stimulate hair growth, but increases the health of the scalp and improves the condition of the existing hair
- The blood circulation of the scalp is stimulated - amino acids are supplied to strengthen the hair

Ingredients:

- Biotin
- Amino acids
- Ginseng Extract
- Saw Palmetto Extract
- Nettle root extract
- Classical Ayurvedic ingredients are combined with amino acids



NIOXIN

The concept

Basis of the product: **Stemoxidine**

- Stemoxidine = Molecule, which controls the supply of oxygen at the hair follicle
- The assumption of the scientists is that by reducing the supply of oxygen the hair follicles could be stimulated
- By reducing the oxygen supply the hair follicles could be "awakened".



NEOGENIC

COMPETITORS HAIR GROWTH SERUM

VICHY

Vichy Dercos 28x6 ml 75,00 €*
Neogenic, 1-month-supply



ROGAINE

Topical Solution 3x60ml 67,50 €*
3-month-supply



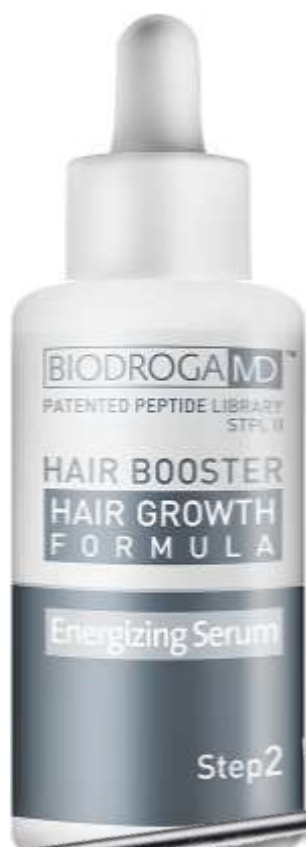
BIODROGA MD

Energizing Serum 100ml 98,00 €*
2-months supply



*recommended retail price
Germany

NEW DESIGN: BIODROGA MD HAIR BOOSTER



NEW
FORMULA



Shampoo Concentrate

A new formulation:

More care
for smooth, shiny hair!

**NEW
FORMULA**



**Shampoo Concentrate,
75ml, 2 month supply
€ 39,-***



**Energizing Serum,
100ml , 2 month supply
€ 98,-***

* Recommended retail price Germany



NO LIMITATIONS:

No negative interaction
between the Hair Booster
products and any hair color
and styling products



BIODROGA MD

HAIR CARE

WHICH

TOUCHES



THANK YOU FOR YOUR ATTENTION!

BIODROGA MDTM