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HEALING KELOID BY APPLYING LOCALLY SILICON GEL

Accidents, surgical operations, burns and skin diseases such as acnes are the main causes of provoking scars. These scars are enlisted as:

- **1. Flat red or reddish scars.** They are the most common type and the result of the normal skin irritation. At first they appear as dark swollen spots which eventually become lighter and flatten. This healing process can last up to 2 years.
- **2. Hypertrophy scars.** They are red or reddish and swollen. They form as the new collagen replaces the damaged one. They could be painful and itchy.
- **3. Keloid scars.** Keloid are inflated scars protrude the healthy skin, remaining rough for a lifetime. They are painful and itchy.

Healing treatment of keloid comes in many ways:

- A) Very careful surgical removal while applying cortisone injection at the spot.
- B) Betamethasone Acetate + Disodiumphospho Betamethasone inside the wounded skin. This solution is applied four times a month during a four month period and it results in reducing the size of the damage as well as smoothing the wounded area and rendering it more elastic. This healing process is painful.
- C) Applying pressing bandage on a twenty four hour basis for months. This method is efficient when applied in time.
- D) Cryotherapy (Liquid Nitrogen) with good results in elasticity, the size and the itchiness of the keloid.

- E) Pulsed Dye Laser.
- F) Surgical removal of the keloid while applying radiotherapy.
- G) Smearing gel silicon twice a day for six months.

We present the applying of gel silicon results on keloid attributed to acne or burns or automated keloid.

Material and methods

Ten patients with keloid scars on the face, on the back and on the chest were chosen. They underwent in gel silicon healing treatment daily for 6 months – day and night – every day.

Eight (8) of them had had recent scars and the rest two (2) had had scars for ages. The patient age had been ranged from 6 to 35 years, both male and female. Four (4) of them had had keloid scars attributed to burn, two (2) of them attributed to severe facial ozoncystic acnes, three (3) of them attributed to chest and back ozoncystic acnes and the last one (1) attributed to automatic keloid scars.

Patients		Age	Explanation	
A.D.	3	15	Acne	
B.M.	\$	6	Burn	
O.M.	\$	16	Acne	
M.F.	\$	30	Automatic	
A.B	3	15	Burn	
B.B	\$	30	Burn	
A.D.	3	32	Burn	
O.E.	3	18	Acne	
A.N.	\$	19	Acne	
D.M.	3	15	Acne	

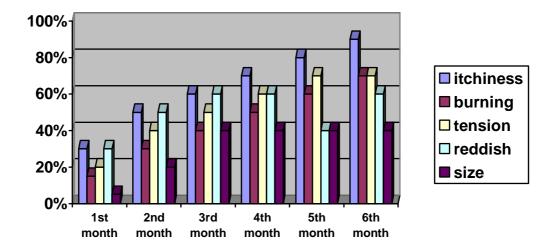
Subjective	Objective			
itchiness	Reddish			
Burning	Size-same colour			
Inclination	Elasticity			

The patients used to visit the hospital once a month for six (6) months and they were shot each time. The physician estimated the damaged tissues and asked the patients how they would estimate their gel silicon therapy subjectively according to:

- 1) Itchiness,
- 2) Inclination
- 3) Burning.

Then the physician estimated the healing process according to: reddish and the damaged issue size (in 3 dimensions) and the skin elasticity. During the healing process and the patients' observation, a great improvement of the subjective symptoms had been recorded, especially of

itchiness in all the patients, while the size and the reddish of the damaged tissues were objectively reduced. This method had better results in patients with recent keloid scars.



Picture: The progress of damaged tissues improvement within 6 months in percentage (%)

	1st month	2nd month	3rd month	4th month	5th month	6th month
Itchiness	30 %	50 %	60 %	70 %	80 %	90 %
Burning	15 %	30%	40 %	50%	60%	70%
Tension	20%	40%	50%	60%	70%	70%
Reddish	30%	50%	60%	60%	60%	60%
size	5%	20%	40%	40%	40%	40%

TABLE ANALYZATION

Discussion

Keloids are reddish, abnormally raised, over colored and itching damages. Itchiness is mainly produced by the increase of the mast cells.

Genetical factors regulate the production of keloid and are associated with tissue compatible antigens HLA B21, BW14, BW16.BN35, DR%, DQW3 and the A blood type. They are inherited with the dominative as well as the residual character.

They are found on Chinese, Polynesians and the 16% of the black race does present keloid.

The first description of keloid was found on the Ancient Egyptians Scroll (1700 b c). In 1806 Albert used the term keloid from the Greek word «χηλή» (horse hoof); to describe the abnormal tissue raise.

Young women between 10-30 years old are the most vulnerable victims. Vitamin A, C, and E, Selenium and Zinc help to prevent keloid formation. Amino-acids are also necessary for the new tissues formation and along with vitamins and enzymes support the normal collagen formation. Such products are sold in the market as food supplementary.

The keloid pathology has not been fully understood but it has been remarked that cytokines, such as interleukin 1 and the modified grown factor b could be responsible for the collagen metabolism changes who leads to keloid formation.

Nitrogen Oxide (NO) increase is also important, a free radical that is responsible for abnormal collagen formation and in further keloid scar formation. The silicon gel effects on keloid seem to associate to the mast cell decrease. The use of cortisone injection inside keloid scar seems to decrease significant the Nitrogen Oxide (NO).

Applying silicon gel has great results in keloid healing. It is easily used, painless and applicable without any further problems, while the patients are under therapy. It improves the annoyances subjectively and especially the itchiness.

CASE 1

Healing hypertrophy acne scars with cauterization, scrubbing and applying Kelogen cream (Version).



Photo. 1: In the beginning of treatment



Photo. 2: In the means of treatment



Photo. 3: In the end of treatment

CASE 2
Healing keloid by using cryotherapy and silicon gel.



Photo. 1 : In the beginning of treatment



Photo. 2: In the end of treatment

CASE 3
Using Kelogel locally. At first there was prolonged use of cortisone locally, which provoked telangiectasis.



Photo. 1: In the beginning of treatment



Photo. 2: In the end of treatment

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