# CREAM <u>CLEAN SKIN</u> FOR BROKEN CAPILLARIES AND SPIDER VEINS (RN07)



#### Ingredients

Purified water, peptide complex A-3, licorice root extrace, birch bark "Betulavit"<sup>®</sup>, glycerol monostearate, Ceteareth-2, Ceteareth-21, PPG/PEG-4/14 dimethicone, bis-2-Diglyceryl poliatsiladipat, stearin, ethylhexyl cocoate, witch hazel extract, grape seed oil, emulsifying wax, phenoxyethanol Ethylhexylglycerin, triethanolamine, dimethicone, silver citrate, Perfume.

### Main components

## Betulavit

The unique healing properties and the snow-white birch trunks birch gives betulin substance from the class of triterpenoids (triterpene dialcohol lupane). White Birch retained even when the tree is completely decayed microflora resistant elm owes betulin.

Numerous studies have shown that betulin really has the most valuable pharmacological properties: anti-inflammatory; antibacterial and antifungal; antioxidant (slows the aging process), regenerating (acts on receptors in the skin responsible for the renewal of the epidermis); moisturizing (improves TEWL); antiallergic. Proven hepatoprotective, hypocholesterolemic, cholagogue. antilitogennye properties of betulin with internal applications. Extremely important is the antitumor effect of betulin in melanoma, carcinoma, tumors of the intestines.

The scientific team of the company offered an original technology (patent number 2,206,572) obtaining betulin food quality fullest extraction of the total amount of triterpene compounds. This technology forms the basis for the creation of a new commercial product Betulavit (birch bark extract) exclusive of raw materials for the cosmetic and food industry, which has the most valuable pharmacological properties: antioxidant, slows the aging process, anti-inflammatory, antibacterial, antifungal, regenerating, acting on receptors in the skin responsible for the renewal of the epidermis , moisturizing and anti-allergicThe new technology provides an introduction betulin into finished products at the level of micellar colloidal dispersion, which allows to achieve the maximum degree of distribution on the surface of the skin penetration betulic factions in stratum corneum (horny layer of the epidermis) and high performance cosmetics.

Betulin concentrates have also been developed for incorporation into food products as dietary supplements, which provide high bioavailability of the drug.

# Silver citrate

The antimicrobial activity of silver is known to mankind for over 100 years:

- effective silver antimicrobial,
- application is safe for human health,
- natural biocide
- a variety of techniques based on the use of silver have been used successfully in medicine and other (technical) areas including vodootchistku, dressing wounds, etc.,
- use of silver in cosmetics has not been successful so far because of the limited compatibility and stability of available products on the market based on silver in cosmetic products, which resulted in a precipitate, discoloration and reduced efficiency.

#### Mechanism of action

- active current components are silver ions TINOSAN®SDC,
- silver ions react with the nucleophilic groups of amino acids and proteins, enzymes, and membrane components (such as sulfogidril-, amino, imidazole, phosphate and carboxyl groups),
- inhibition mechanisms of transport,
- inhibition of metabolism of microbial cells,
- ie non-specific mechanism of action silver ions are exposed to the bacteria for more than 4 billion years, and still not have caused the appearance of any resistance to them.

We see serious problems with the widely used preservatives in cosmetics

Parabens

- Under the "pressure" of the discussion of the endocrine activity and sensbiliti.
- Buyers are looking for alternative products and refuse from raw materials using parabens.
- Cosmetic products "without Paraben" becoming very popular.

Bronopol / Bronidoks

• Galogenizirovannye May form nitrosamines in combination with the nitrite and the amines.

Isothiazolinone (MIT / CIT)

• Senisibilizatory not stable at temperatures between 40 ° C and higher chlorinated products.

TINOSAN<sup>®</sup>SDC has preservative ability

- Tinosan<sup>®</sup>SDC shows excellent preservative capacity at low concentrations (0.1% 0.3%),
- provides in addition to preserving the deodorizing and antibacterial effects,
- can be combined with a wide range of preservatives to increase efficiency,
- does not contain formaldehyde, does not contain phenol,
- not halogenated,
- without quaternary ammonium compounds,
- has an advantageous toxicological and environmental profile,
- a natural ingredient.

Test preservative ability / capacity

Test organisms

- Ø Gram negative bacteria
  - Pseudomonas aeruginosa
  - Escherichia coli
- Ø Gram-positive bacteria
  - Staphylococcus aureus

• Ø Yeast
- Candida albicans
Ø Mushrooms
- Aspergillus niger.
- Asperginus niger.
The test organisms should reflect a broad range of microbial contaminants and spoilage of cosmetic products
TINOSAN®SDC - ideal antimicrobial component for cosmetics
Liquorice root
Form release:
30 ml
Production
Scientific and Production Center of Revitalization and Health
St. Petersburg University of Bioregulation and Gerontology