

Saskine™ 50

Multifunctional Ingredient for Cosmetics



mission. critical. chemistry.

APPLICATION

Saskine™ 50 can be used in a broad range of cosmetic applications.

Saskine™ 50 is a very effective active component in deodorants and finds important use in preservative formulations due to its inhibiting effect on the growth of odor-causing bacteria while not affecting the skin flora.

Saskine™ 50 enhances the antimicrobial efficacy of typically used preservatives like phenoxyethanol, pentylene glycol, caprylyl glycol, isothiazolinones or parabenes and by doing so enables lower concentrations of the cosmetic preservative in the formulation applied.

Saskine™ 50 ingredients have been used in the cosmetic market for decades, especially as

component in alternative parabene- and triclosan-free formulations, or even preservative-free formulations. Moreover, Saskine™ 50 is multifunctional in that it also improves the skin feel of cosmetic formulations and functions as emollient and mild humectant. The skin-feel of Saskine™ 50 can be compared to the chemically closely related glycerin.

Recommended use concentrations of Saskine™ 50 as skin care additive and deodorant active are 0.3 to 1.0%. It can be used in the 2-12 pH range.

Saskine™ 50 is very soluble in organic solvents like alcohols, glycols, glycol ethers and paraffin oil. Its solubility in water is limited (ca. 0.1%) and the addition of co-solvents like butylene glycol might be needed in water solutions (or water with lower alcohol mixtures).

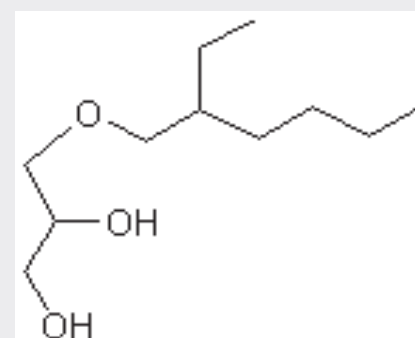
BENEFITS

- Very active deodorant additive, boosts antimicrobial efficacy
- Enables lower concentrations of typically used preservatives
- Alternative component in formulations free of parabens or triclosan
- Multifunctional preservative component with emollient and humectants functionality
- Approved globally

DESCRIPTION

Saskine™ 50 is a crystal-clear colorless and almost odorless liquid cosmetic additive that is mainly used in preservation. Saskine™ 50 is very stable and compatible with cosmetic ingredients.

INCI-name: Ethylhexylglycerin
 Chemical IUPAC name: 3-(2-ethylhexyloxy)propane-1,2-diol
 CAS number: 70445-33-9



▶ Product Information

Physical Properties	
Formular weight	204.31 g/mol
Molecular formula	C ₁₁ H ₂₄ O ₃
Purity	>99 %
Appearance	clear, colorless liquid
Odor	practically odorless
Density (20°C)	ca. 0.95 g/ml
Boiling point	>285 °C (1 atm)
Flashpoint	152 °C
Refractive index (20°C)	ca. 1.451
Viscosity	145 mPa s
Water solubility (22°C)	ca. 1.0 g/l
Distribution coefficient (n-octanol/water)	log P _{ow} = 2.53 (20°C)

Toxicology & Regulatory Data

From its many years of use and from literature it is known that Ethylhexylglycerin is non-toxic and non-irritant to the skin upon oral administration and dermal application. Also no sensitizing or allergic reactions are known for Ethylhexylglycerin, which proved non-mutagenic as well. Saskine™ 50 in its pure form is labeled with Xn-harmful.

ELINCS name: 3-(2-ethylhexyloxy)propane-1,2-diol

ELINCS number: 408-080-2

REACH registration number: 01-0000015745-65-0002

TSCA listed

SACHEM is a 9001 and 14001 certified company.

Packaging & Shipping

Samples are available in 250 ml containers. Commercial quantities are available in HDPE can (25L, 20kg net) and in HDPE drums (225L, 200kg net)

We recommend storage in the original packaging at or below room temperature and not in direct sunlight. Once opened packaging should be closed tight again with ideally a blanket of nitrogen or argon.

About SACHEM

Headquartered in the United States, SACHEM is a chemical science company with full commercial operations and research facilities in North America, Europe, China and Japan. Since 1950, SACHEM has established leading positions in key growth markets through innovation, technical expertises, revolutionary service, and an unwavering commitment to health, safety, the environment and ethics. Our technology evolves around high purity and is successfully applied in electronic and energy materials, biotechnology, pharmaceuticals, catalyst and other dynamic markets. SACHEM broadened its scope to the personal care market and seeks to support customers in environmentally driven trends, such as in the preservative area with Saskine™ 50.