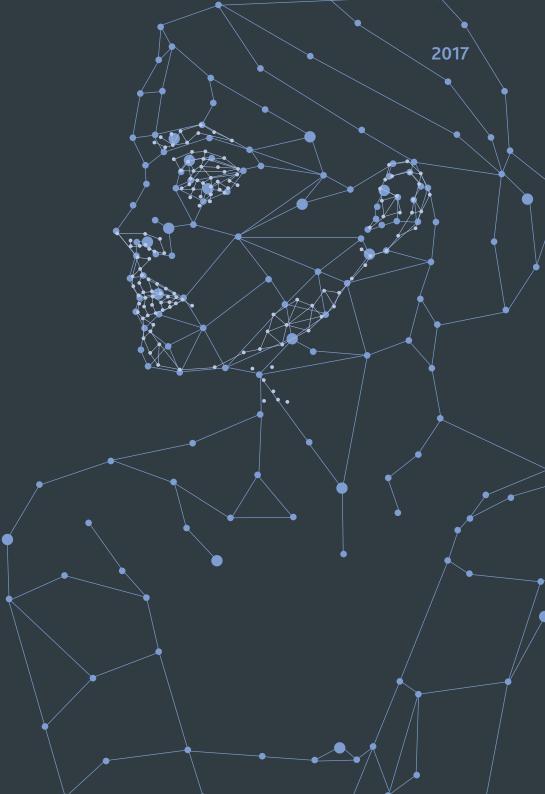
# Preservation –

### alternative and functional





### Introduction

Right from the start, Cosphatec GmbH has specialised in the development and production of alternative preservatives. As well as competent consultancy services, we offer our clients tailor-made and cost effective solutions for the replacement or reduction of listed, controversially discussed preservatives. We want to help you improve the tolerability of your cosmetic products, to achieve a higher level of product safety and thus increase your marketing potential. Our portfolio includes these three product groups:

#### 1. Cosphaderm<sup>®</sup> – Purely natural alternative multifunctionals

We use careful and gentle extraction processes to isolate ingredients that are ECOCERT and COSMOS certified. These substances have a number of positive properties, including strong antimicrobial efficiency.

#### 2. Cosphaderm® – Nature-identical alternative multifunctionals

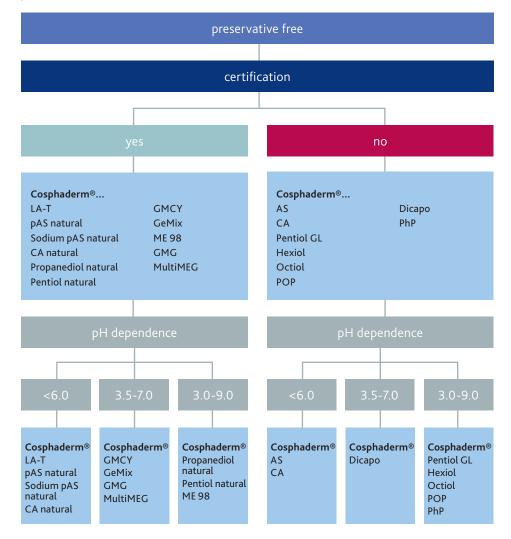
Using Mother Nature as our blueprint, we develop and produce ingredients that have many positive properties. Although these substances are chemically identical to natural materials, they are produced synthetically, which keeps costs down.

#### 3. Cosphagard® – Preservative blends

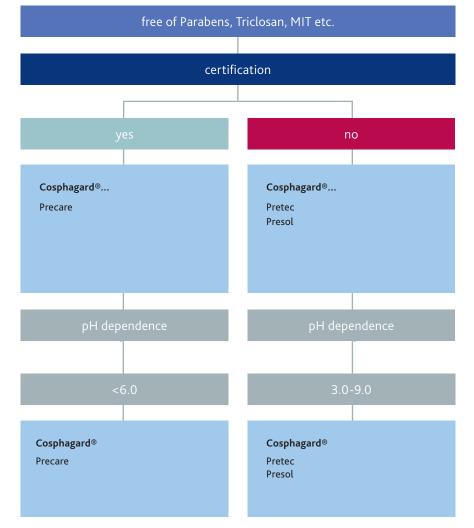
These inexpensive blends contain both popular and alternative preservatives. The aim is to replace substances such as parabens or MIT and to reduce listed preservatives. We offer purely synthetic, but also certifiable solutions, suitable for natural cosmetics.

### **Certification List**

Your first step is quickly identifying the ingredients that meet your needs. Our blends offer an all-round solution and are designed to ensure high efficiency against bacteria, yeasts and molds.



In most cases it makes sense to combine a variety of individual substances in order to bring out their full potential. We are happy to provide you with recommendations.



### Detailed list of alternative preservatives

Your second step is using this table to see the most important information for each individual substance. The table lists the INCI name, shelf life, certification status,

source of the ingredient, its functions, antimicrobial properties, pH dependence, recommended concentration and solubility.

		EFFICIENCY FIELD										
	INCI	Shelf life	Ecocert	Соѕмоѕ	Source	Function	Bacteria	Yeast	Molds	pH-range	rec. Conc. [w/w]	Solubility
Cosphaderm <sup>®</sup> LA-T	Levulinic Acid, Clycerin, Sodium Levulinate, Aqua	36 months	٠	•	Sugar cane, Vegetable oil	Perfuming, Skin conditioning, Denaturant, Antimicrobial	•	•	0	<6.0	1.0 %	water
Cosphaderm <sup>®</sup> pAS natural	p-Anisic Acid	24 months	٠	•	Star Anise	Masking, Antimicrobial	•	•	•	<6.0	0.2 %	app. 0.3 g/l in water, soluble in alcohol
Cosphaderm® Sodium pAS natural	Sodium Anisate	24 months	•	•	Star Anise	Flavouring, Antimicrobial	•	•	•	<6.0	0.3 %	easily soluble up to 10 g/l in water, also soluble in alcohol
Cosphaderm® CA natural	Cinnamic Acid	24 months	•	•	Cinnamomum Cassia	Skin conditioning, Perfuming, Antimicrobial	•	•	٠	<6.0	0.2 %	app. 0.5 g/l in water, soluble in alcohol
Cosphaderm <sup>®</sup> Propanediol natural	Propanediol	24 months	٠	٠	Vegetable oil	Solvent, Humectant, Skin conditioning, Antimicrobial	0	0	0	pH-inde- pendent	booster	completely water-miscible
Cosphaderm® Pentiol natural	Pentylene Glycol	24 months	•	•	Sugar cane bagasse/corn cobs	Skin conditioning, Solvent, Antimicrobial	•	•	•	pH-inde- pendent	5.0 %	completely water-miscible
Cosphaderm® GMCY	Glyceryl Caprylate	36 months	•	•	<i>Vegetable oil</i>	Emollient, Emulsifying, Antimicrobial	•	•	0	3.5-7.0	0.5 %	insoluble/dispersible in water, soluble in alcohol
Cosphaderm® GeMix	Glyceryl Caprylate, Glyceryl Undecylenate	18 months	•	•	<i>Vegetable oil</i>	Emollient, Emulsifying, Skin conditioning, Antimicrobial	•	•	•	3.5-7.0	1.0 %	insoluble/dispersible in water, soluble in alcohol
Cosphaderm® Magnolia Extract 98	Magnolia Officinalis Bark Extract	24 months	٠	•	Magnolia Officinalis Bark Extract	Skin conditioning, Anti-acne, Anti- cariogen, Antioxidant, Antimicrobial	•	٠	٠	pH-inde- pendent	0.2 %	insoluble in water, soluble in oil and alcohol

	INCI	Shelf life	Ecocert	Соѕмоѕ	Source	Function	Bacteria	Yeast	Molds	pH-range	rec. Conc. [w/w]	Solubility
Cosphaderm® GMG	Glyceryl Caprylate, Propanediol, Glycerin, Magnolia Officinalis Bark Extract, Psidium Guajava Leaf Extract	12 months	٠	•	Vegetable oil, Magnolia Officinalis Bark Extract, Guava Extract	Skin conditioning, Emollient, Emulsifying, Viscosity controlling, Anti-acne, Anticariogen, Antioxidant, Antimicrobial	•	•	٠	3.5-7.0	1.4 %	soluble in alcohol and fats, dispersible in water
Cosphaderm® MultiMEG	Glyceryl Caprylate, Pentylene Glycol, Magnolia Officinalis Bark Extract	18 months	٠	•	Vegetable oil, Sugar cane bagasse/ corn cobs, Magnolia Officinalis Bark Extract	Antioxidant, Anti-irritant, Anti-acne, Anticariogen, Skin conditioning, Antimicrobial	•	•	•	3.5-7.0	1.2 %	soluble in alcohol and fats, dispersible in water
Cosphaderm <sup>®</sup> AS	p-Anisic Acid	36 months	•	•	Synthetic	Masking, Antimicrobial	•	•	•	< 6.0	0.2 %	app. 0.3 g/l in water, soluble in alcohol
Cosphaderm <sup>®</sup> CA	Cinnamic Acid	24 months	٠	•	Synthetic	Skin conditioning, Perfuming, Antimicrobial	٠	٠	٠	< 6.0	0.2 %	app. 0.5 g/l in water, soluble in alcohol
Cosphaderm <sup>®</sup> Pentiol GL	Pentylene Glycol	24 months	٠	٠	Synthetic	Skin conditioning, Solvent, Antimicrobial	•	•	٠	pH-inde- pendent	5.0 %	completely water-miscible
Cosphaderm® Hexiol	1,2-Hexanediol	24 months	٠	٠	Synthetic	Skin conditioning, Solvent, Antimicrobial	•	٠	٠	pH-inde- pendent	2.5 %	completely water-miscible
Cosphaderm® Octiol	Caprylyl Glycol	36 months	٠	٠	Synthetic	Emollient, Hair conditioning, Humectant, Skin conditioning, Antimicrobial	٠	٠	٠	pH-inde- pendent	0.5 %	7.5 g/l in water, soluble in alcohol
Cosphaderm <sup>®</sup> Dicapo	Caprylyl Glycol, Dipropylene Glycol, Clyceryl Caprylate	36 months	•	•	Synthetic	Emollient, Hair conditioning, Humectant, Skin conditioning, Emulsifying, Solvent, Viscosity controlling, Antimicrobial	•	•	٠	3.5-7.0	0.7 %	soluble in alcohol and fats, dispersible in water
Cosphaderm® POP	Propanediol, Caprylyl Glycol, Phenylpropanol	12 months	٠	•	Synthetic	Emollient, Humectant, Skin conditioning, Emulsifying, Masking, Perfuming, Hair conditioning, Antimicrobial	•	•	•	pH-inde- pendent	1.0 %	ca. 14 g/l in water, soluble in alcohol
Cosphaderm <sup>®</sup> PhP	Phenylpropanol	12 months	•	•	Synthetic	Masking, Perfuming, Solvent, Antimicrobial	•	•	٠	рН-inde- pendent	0.3 %	soluble in alcohol, diols and fats, dispersible in water

• approved • most likely approved • unapproved

strong
moderate
weak

## Detailed list of preservatives

			Efficiency field									
	INCI	Shelf life	Ecocert	Соѕмоѕ	Source	Function	Bacteria	Yeast	Molds	pH-range	rec. Conc. [w/w]	Solubility
Cosphagard <sup>®</sup> Pretec	Phenoxyethanol, Benzyl Alcohol, Phenylpropanol	12 months	•	•	Synthetic	Antimicrobial, Masking, Perfuming, Solvent, Preservative	•	•	٠	pH-inde- pendent	1.0 %	dispersible in water, soluble in oil, alcohol and diols
Cosphagard <sup>®</sup> Presol	Phenoxyethanol, Benzyl Alcohol, Phenethyl Alcohol	24 months	•	•	Synthetic	Antimicrobial, Masking, Perfuming, Solvent, Preservative	•	•	٠	pH-inde- pendent	1.0 %	soluble in water and in oils
Cosphagard <sup>®</sup> Precare	Aqua, Sodium Levulinate, Sodium Benzoate	24 months	•	•	Sodium Levulinate (natural), Sodium Benzoate (synthetic)	Antimicrobial, Masking, Perfuming, Solvent, Preservative	•	•	٠	< 6.0	4.5 %	soluble in water

approved most likely approved unapproved