Version: 01.2023

Material safety data sheet

According to EU Regulation 1907/2006 in the current version

PRESERVATIVE BS

1. Identification of the substance/mixture and company

Trade name:	Preservative BS
I.N.C.I.	Aqua, Sodium Benzoate, Potassium Sorbate
CAS No. :	7732-18-5, 532-32-1, 24634-61-5
EC No. :	231-791-2, 208-534-8, 246-376-1
REACH pre-registration No. :	01-2119460683-35-xxxx, 01-2119950315-41-xxxx
Utilization:	Raw material for cosmetics
Supplier company identification:	Elemental SRL, Piața Cazărmii no.15, 410188-Oradea, jud.Bihor, Romania Tel/Fax: +40259-436.755, www.ellemental.com
Emergency:	RO: număr național pentru cazuri de urgență: 021 3183606 Institutul de Sănătate Publică București. International emergency number: +49 180 2273-112

2. Hazards Identification

2.1 Classification of the substance or mixture

Classification of this product has been carried out in accordance with Regulation (EC) No 1272/2008.
Eye Irrit. 2 H319 Causes serious eye irritation

2.2 Label elements

Signal word: Warning
Pictograms: GHS07

Hazard pictograms:

Hazard statement:
Causes serious eye irritation

Precautionary statements:
Wear eye protection / face protection.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If eye irritation persists: Get medical advice/attention

2.3 Other hazards:
none

3. Declaration of ingredients

3.1. Substances
Non-applicable

3.2. Mixtures
In accordance with Annex II of Regulation (EC) No 1907/2006 (point 3), the product contains:

Material safety data sheet
According to EU Regulation 1907/2006 in the current version
PRESERVATIVE BS

CAS: 532-32-1 EINECS: 208-534-8 Reg.nr.: 01-2119460683-35	sodium benzoate	Eye Irrit. 2, H319	> 25%
CAS: 24634-61-5 EINECS: 246-376-1 Index number: 019-003-00-3 Reg.nr.: 01-2119950315-41	potassium sorbate	Eye Irrit. 2, H319	10 - 25%

Further Information:
Hazard statements see section 16.

4. First aid measures

4.1 Description of first aid measures
Note:
Obtain special instructions from the poison information centre: 0844-892-0111 (UK only)
Personal protection for the First Aider.
After inhalation: Supply fresh air; consult doctor in case of symptoms.
After skin contact Instantly rinse with water.
After eye contact:
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If eye irritation persists: Get medical advice/attention.
After swallowing: IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

4.2 Most important symptoms and effects, both acute and delayed
No further relevant information available.

4.3 Indication of any immediate medical attention and special treatment needed
No further relevant information available.

5. Fire fighting measures

5.1 Extinguishing media
Suitable extinguishing agents:
Product is non combustible. Use fire fighting measures that suit the environment.
Unsuitable extinguishing agents for reasons of safety: None

5.2 Special hazards arising from the substance or mixture
Can be released in case of fire:
Carbon monoxide (CO)

5.3 Advice for firefighters
Protective equipment: Wear self-contained breathing apparatus

6. Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures
Wear protective equipment. Keep unprotected persons away.

6.2 Environmental precautions:
Do not allow product to enter waters without treatment in a (biological) water treatment plant.

6.3 Methods and material for containment and cleaning up:
Dam and absorb spillage with chemical binder.
Smaller amounts of contaminated binding material can be disposed as non-hazardous industrial waste.

6.4 Reference to other sections None

7. Handling and storage

7.1 Precautions for safe handling
Provide good room ventilation or local exhaust ventilation at the workplace.
Assess hazards arising from work equipment and work places.
Information about protection against explosion and fire: No special measures required.

7.2 Conditions for safe storage, including any incompatibilities
Requirements to be met by storerooms and containers:
Should be stored in the delivery-container preferably.
Information about storage in a common storage facility: none
Further information about storage conditions:
Possibility of reversible formation of crystals at temperatures < 5°C. After warming up and stirring the product can be used again.
Minimum storage temperature: 5 °C

7.3 Specific end use(s) No further relevant information available

8. Exposure controls / personal protection

8.1 Control parameters
Components with critical values that require monitoring at the workplace: None established.

8.2 Exposure controls
Technical protective equipment:
In case of contamination devices to rinse eyes or skin immediately under running water must be available.
Individual protection measures, such as personal protective equipment
General protective and hygienic measures:
Avoid contact with the eyes and the skin.
Wash hands during work breaks and at the end of the shift.
Use skin cream for skin protection.
Provide skin protection plan.

Respiratory protection: not required

Hand protection
Chemical protective gloves (EN ISO 374-1:2016)
After use of gloves apply skin-cleaning agents and skin cosmetics.
Material of gloves Nitrile rubber, NBR
Penetration time of glove material:
Thickness: 0.4 mm; break-through time: 480 min; material: Nitrile; permeation: level 6
Gloves made of the following materials are not suitable:
Gloves for mechanical protection do not provide protection against chemicals.

Eye/face protection
Safety glasses (EN 166)

Body protection:
Protective clothing (EN 14605:2009-08)

Risk management measures
The operators shall be instructed adequately.
The workplace shall be inspected regularly by competent personnel e.g. the safety representative

9. Physical and chemical properties

9.1 Information on physical and chemical properties
General Information
Form: liquid
Colour: yellow to brownish Clear
Odour: Mild
Odour threshold: Not relevant for safety
pH at 20 °C 8.8-9.8 slightly alkaline
Melting point/freezing point: not determined
Boiling point or initial boiling point and boiling range ca. 100 °C (H_2O)
Flash point: The mixture has no flashpoint.
Flammability Not applicable
Decomposition temperature: Not determined.
Self-inflammability: Product is not self-igniting.
Lower and upper explosion limit
Lower: Not applicable
Upper: Not applicable
Oxidising properties None
Vapour pressure at 20 °C: 23 mbar (H_2O)
Density and/or relative density
Density at 20 °C: 1.16-1.18 g/cm3
Relative density (D^{20}_4): Not determined
Vapour density: Not determined
Evaporation rate: Not determined
Solubility
Water: Fully miscible

Partition coefficient n-octanol/water (log value) see section 12
Viscosity: dynamic (η): Not determined
Solids content: 43.5 - 46.5

9.2 Other information No further relevant information available
Refraction index: Non-applicable

10. Stability and reactivity

10.1 Reactivity
The evaluation of the relevant available information does not show an indication of any metal corrosive property.

10.2 Chemical stability
Conditions to be avoided: No decomposition if used according to specifications.
Minimum shelf life: 18 months from production date
.
10.3 Possibility of hazardous reactions No dangerous reactions known.

10.4 Conditions to avoid No further relevant information available.

10.5 Incompatible materials: No further relevant information available.

10.6 Hazardous decomposition products:
None, if storage and handling is done according to specification

11. Toxicological information

11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008
Acute toxicity Based on available data, the classification criteria are not met.
Acute toxicity estimates (ATE) or LD_{50}/LC_{50} values:
oral ATE > 5,000 mg/kg (calculated), dermal ATE > 2,000 mg/kg (calculated)
Skin corrosion/irritation: Based on available data, the classification criteria are not met.
Serious eye damage/irritation: Causes serious eye irritation.
Sensitisation: Based on available data, the classification criteria are not met.
Germ cell mutagenicity: Based on available data, the classification criteria are not met.
Carcinogenicity: Based on available data, the classification criteria are not met.
Reproductive toxicity: Based on available data, the classification criteria are not met.
STOT-single exposure: Based on available data, the classification criteria are not met.
STOT-repeated exposure: Based on available data, the classification criteria are not met.
Aspiration hazard: Based on available data, the classification criteria are not met

12. Ecological information

12.1 Toxicity
Aquatic toxicity:
532-32-1 sodium benzoate
EC_{10} / 72 h 6.5 mg/l (Algae) literature

EC_{50} / 72 h > 30.5 mg/l (Algae) (OECD 201) literature
EC_{50} / 48 h > 100 mg/l (Daphnia) (OECD 202) literature
LC_{50} / 96 h > 100 mg/l (Daphnia) literature
> 100 mg/l (Leuciscus idus m.) literature
484 mg/l (fathead minnow) (EPA OPP 72-1) literature
NOEC 10 mg/l (Brachydanio rerio) (6 d) literature

24634-61-5 potassium sorbate
EC_{50} / 48 h 982 mg/l (Daphnia) (OECD 202) Dossier (REACh)
480 mg/l (Desmodesmus subspicatus) (OECD 201) Dossier (REACh)
LC_{50} / 96 h > 500 mg/l (Brachydanio rerio) (OECD 203) Dossier (REACh)
NOEC / 21 d 50 mg/l (Daphnia) (OECD 211) Dossier (REACh)
Evaluation:
Based on the available data the classification criteria for hazard classes aquatic acute (short term) toxicity are not fulfilled. Based on the available data the classification criteria for hazard classes aquatic, chronic (long term) toxicity are not fulfilled.

Toxicity on activated sludge organisms:
Evaluation:
If contaminated effluent water is properly entered into the sewage system, any interference with the degrading activity of the activated sludge organisms is not expected.

12.2 Persistence and degradability
Rapid degradability of organic substances:
532-32-1 sodium benzoate
OECD 301 B CO_2-Evolution 90 % Literature
24634-61-5 potassium sorbate
OECD 301 D Closed-Bottle-Test 74.9 % read across from CAS-no. 110-44-1 - Dossier (REACh)

Evaluation:
The component(s) is (are) rapidly degradable.
Substances are considered rapidly degradable in the environment if one of the following criteria holds true: if, in 28-day ready biodegradation studies, at least the following levels of degradation are achieved within 10 days of the start of degradation: 70% dissolved organic carbon or 60% oxygen depletion or carbon dioxide generation; (see CLP-Regulation Annex I section 4.1.2.9 and CLP Guidance version 4.1 Annex II.2).
Behaviour in sewage treatment plants:
Evaluation: The substances are biodegradable/eliminable in activated sludge units.

12.3 Bioaccumulative potential
Bioconcentration factor (BCF) / octanol/water partition coefficient (LogKow):
532-32-1 sodium benzoate
OECD 117 Log Kow Partition Coefficient 1.88 (n-octanol/water) literature (bencoic acid)
24634-61-5 potassium sorbate
OECD 117 Log Kow Partition Coefficient $\leqslant$ 1.72 (n-octanol/water) Dossier (REACh)
Evaluation: Not worth-mentioning accumulating in organisms

12.4 Mobility in soil No further relevant information available.

12.5 Results of PBT and vPvB assessment
PBT: This mixture does not contain substances that meet the PBT-criteria of REACH, annex XIII.
vPvB: This mixture does not contain substances that meet the vPvB-criteria of REACH, annex XIII.

12.6 Other adverse effects none

12.7 Additional information
Metals and their compounds (Directive 2006/11/EC): None
European Water Framework Directive (2000/60/EC):
The product does not contain any priority substances according WFD that require a water monitoring.
Absorbable organic halogen compounds (AOX - DIN EN ISO 9562 H 14):
The product does not contain substances, which can influence the AOX of waste water.

13. Disposal considerations

13.1 Waste treatment methods
Recommendation Hazardous waste. Separate waste disposal to be applied.
Contaminated packaging:
Recommendation:
Packaging can be reused or recycled after cleaning.
Cleaning liquid can be fed to a biological wastewater treatment plant.
Recommended cleaning agent: Water, if necessary with cleaning agent

14. Transport information

This product is not regulated for transport (ADR/RID,IMDG,IATA)
14.1 UN number or ID number
ADR, IMDG, IATA None
14.2 UN proper shipping name
ADR, IMDG, IATA None
14.3 Transport hazard class(es)
ADR, IMDG, IATA
Class None
14.4 Packing group
ADR, IMDG, IATA None
14.5 Environmental hazards:
Marine pollutant: No
14.6 Special precautions for user Not applicable.
14.7 Maritime transport in bulk according to IMO instruments Not applicable.
Transport/Additional information: No dangerous goods.
UN "Model Regulation": None

15. Regulatory information

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture
Directive 2012/18/EU - Seveso III
Named dangerous substances - ANNEX I none
15.2 Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

Material safety data sheet

According to EU Regulation 1907/2006 in the current version

PRESERVATIVE BS

16. Additional information

Relevant phrases
H319 Causes serious eye irritation.

Classification according to Regulation (EC) No 1272/2008
The classification includes the relevant available information about the mixture or the substances contained therein. The evaluation of the available information within the scope of classification refers to the forms and aggregate states in which the mixture has been placed on the market and will be used most likely.

Abbreviations and acronyms:
RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)
ICAO: International Civil Aviation Organisation
PBT: persistent, bioaccumulative, toxic
vPvB: very persistent, very bioaccumulative
EN ISO: iso norm adopted as a European standard.
DIN EN: European norm adopted as a German standard.
OECD: Organisation for Economic Co-operation and Development
ECxx: Effect concentration, xx percent
NOEC: No Observed Effect Concentration
UN: United Nations
GHS: Globally Harmonised System of Classification and Labelling of Chemicals
EINECS: European Inventory of Existing Commercial Chemical Substances
CAS: Chemical Abstracts Service (division of the American Chemical Society)
LC50: Lethal concentration, 50 percent
LD50: Lethal dose, 50 percent
CLP: Classification, Labelling and Packaging.
Eye Irrit. 2: Serious eye damage/eye irritation – Category 2

Disclaimer:

This material safety data sheet does not constitute a guarantee of the properties of the product and is not a contractual legal report. The information is given in good faith on the basis of our best knowledge of the product at the indicated time. However, we cannot accept responsibility or liability for any consequences arising from its use, no warranty for correctness and completeness is given. We caution the users against the incurred possible risks when the product is used at other ends than the use for which it was initially planned. It is the user's responsibility during handling, storage and product use to consult the main regulatory texts in force regarding workers and environment protection.