Tintometer[®] Group Water Testing



phone: +49 (0)231 94510-0 e-mail: sales@lovibond.com

phone: +44 1980 664800

e-mail: SDS@lovibond.uk

Page 1/8

Safety data sheet according to 1907/2006/EC, Article 31

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

SECTION 1: Identification of the substance/mixture and of the company/undertaking

- · 1.1 Product identifier
- · Product name: KS527 1N Zinc Acetate
- · Catalog number: 56Z052798, 56L052765, 56U052765
- 1.2 Relevant identified uses of the substance or mixture and uses advised against
- · Application of the substance / the preparation: Reagent for water analysis
- · 1.3 Details of the supplier of the safety data sheet
- · Supplier:

Tintometer GmbH Schleefstraße 8-12 44287 Dortmund Made in Germany www.lovibond.com

The Tintometer Limited Lovibond® House Sun Rise Way Amesbury Wiltshire SP4 7GR United Kingdom

· Informing department: e-mail: sds@lovibond.com Product Safety Department

· 1.4 Emergency telephone number:

+44 1235 239670 Languages: English

SECTION 2: Hazards identification

- · 2.1 Classification of the substance or mixture
- · Classification according to Regulation (EC) No 1272/2008



GHS09 environment

Aquatic Chronic 2 H411 Toxic to aquatic life with long lasting effects.



Eye Irrit. 2 H319 Causes serious eye irritation.

- · 2.2 Label elements
- · Labelling according to Regulation (EC) No 1272/2008

The product is classified and labelled according to the GB CLP regulation.

· Hazard pictograms





GHS07 GHS09

· Signal word Warning

(Contd. on page 2)

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

Product name: KS527 - 1N Zinc Acetate

(Contd. of page 1)

· Hazard statements

H319 Causes serious eye irritation.

H411 Toxic to aquatic life with long lasting effects.

· Precautionary statements

P280 Wear protective gloves/protective clothing/eye protection.

P273 Avoid release to the environment.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to

do. Continue rinsing.

P337+P313 If eye irritation persists: Get medical advice/attention.

· 2.3 Other hazards No further relevant information available.

· Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be persistent, bioaccumulative and toxic (PBT) or very persistent and very bioaccumulative (vPvB), according to the criteria given in Annex XIII of Regulation (EC) No. 1907/2006.

Determination of endocrine-disrupting properties

The product does not contain substances with endocrine disrupting properties.

SECTION 3: Composition/information on ingredients

- · 3.2 Mixtures
- · Description: aqueous solution

Dangerous	components:

CAS: 5970-45-6 zinc acetate, dihydrate

10–20%

♦ Aquatic Acute 1, H400 (M=1); Aquatic Chronic 1, H410 (M=1); ♦ Acute Tox. 4, H302; Eye Irrit. 2, H319

Additional information For the wording of the listed hazard phrases refer to section 16.

SECTION 4: First aid measures

- · 4.1 Description of first aid measures
- · General information Instantly remove any clothing soiled by the product.
- · After inhalation Supply fresh air; consult doctor in case of symptoms.
- · After skin contact

Instantly wash with water and soap and rinse thoroughly.

If skin irritation continues, consult a doctor.

- After eye contact Rinse opened eye for several minutes (at least 15 min) under running water. Then consult doctor.
- · After swallowing

Rinse out mouth and then drink 1-2 glasses of water.

In case of persistent symptoms consult doctor.

4.2 Most important symptoms and effects, both acute and delayed:

irritations

after swallowing:

vomiting

diarrhoea

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

SECTION 5: Firefighting measures

- 5.1 Extinguishing media
- · Suitable extinguishing agents Use fire fighting measures that suit the environment.
- 5.2 Special hazards arising from the substance or mixture

The product is not combustible.

Formation of toxic gases is possible during heating or in case of fire.

- · 5.3 Advice for firefighters
- Protective equipment:

Wear self-contained breathing apparatus.

Wear full protective suit.

Additional information

Collect contaminated fire fighting water separately. It must not enter drains.

Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

(Contd. on page 3)

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

Product name: KS527 - 1N Zinc Acetate

Ambient fire may liberate hazardous vapours.

(Contd. of page 2)

SECTION 6: Accidental release measures

- · 6.1 Personal precautions, protective equipment and emergency procedures
- Advice for non-emergency personnel:

Wear protective equipment. Keep unprotected persons away.

Ensure adequate ventilation

- · Advice for emergency responders: Protective equipment: see section 8
- · 6.2 Environmental precautions:

Do not allow product to reach sewage system or water bodies.

Inform respective authorities in case product reaches water or sewage system.

6.3 Methods and material for containment and cleaning up:

Ensure adequate ventilation.

Absorb with liquid-binding material (sand, diatomite, universal binders).

Dispose of contaminated material as waste according to item 13.

6.4 Reference to other sections

See Section 8 for information on personal protection equipment.

See Section 13 for information on disposal.

SECTION 7: Handling and storage

- · 7.1 Precautions for safe handling
- · Advice on safe handling: No special precautions necessary if used correctly.
- Hygiene measures:

Avoid contact with the eyes.

Take off immediately all contaminated clothing.

Wash hands during breaks and at the end of the work.

Do not eat, drink or smoke when using this product.

- · 7.2 Conditions for safe storage, including any incompatibilities
- · Requirements to be met by storerooms and containers: Store in cool location.
- Information about storage in one common storage facility: Not required.
- · Further information about storage conditions:

Protect from heat and direct sunlight.

Protect from the effects of light.

Protect from humidity and keep away from water.

- · Recommended storage temperature: 20°C +/- 5°C
- · 7.3 Specific end use(s) No further relevant information available.

SECTION 8: Exposure controls/personal protection

- · 8.1 Control parameters
- · Components with limit values that require monitoring at the workplace:

The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

Recommended monitoring procedures:

Methods for measurement of the workplace atmosphere have to correspond to the requirements of norms DIN EN 482 and DIN EN 689.

- · Additional information: The lists that were valid during the compilation were used as basis.
- · 8.2 Exposure controls
- Engineering measures:

Technical measures and appropriate working operations should be given priority over the use of personal protective equipment. See item 7.

· Individual protection measures, such as personal protective equipment

Protective clothing should be selected specifically for the workplace, depending on concentration and quantity of the hazardous substances handled.

- · Eye/face protection Safety glasses
- Hand protection

Protective gloves.

(Contd. on page 4)

(Contd. of page 3)

Safety data sheet according to 1907/2006/EC, Article 31

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

Product name: KS527 - 1N Zinc Acetate

Preventive skin protection by use of skin-protecting agents is recommended.

After use of gloves apply skin-cleaning agents and skin cosmetics.

Material of gloves nitrile rubber, NBR

Recommended thickness of the material: ≥ 0.11 mm

Penetration time of glove material

Value for the permeation: Level = 1 (< 10 min)

The exact break trough time has to be found out by the manufacturer of the protective gloves and has to be observed.

- · Other skin protection (body protection): Protective work clothing.
- · Breathing equipment: Use breathing protection against the effects of fumes/dust/aerosol.
- · Recommended filter device for short term use: Combination filter A-P2
- · Environmental exposure controls Do not allow product to reach sewage system or water bodies.

SECTION 9: Physical and chemical properties

 9.1 Information on basic physical and cher 	nical properties
Physical state	Fluid
Form:	Solution
· Colour:	Colourless
· Odour:	Odourless
· Odour threshold:	Not applicable.
· Melting point/Freezing point:	Not determined.
~	

· Boiling point or initial boiling point and boiling range 100°C

· Flammability The product is not combustible. · Explosive properties: Product is not explosive.

· Lower and upper explosion limit

Lower: Not applicable. Not applicable. Upper: Flash point: Not applicable. **Auto-ignition temperature:** Not applicable. · Decomposition temperature: Not determined.

pH at 20°C 3.5

· Kinematic viscosity Not determined.

· Solubility

· Water: Fully miscible

· Partition coefficient n-octanol/water (log value) Not applicable (mixture). Not determined.

· Vapour pressure:

· Density and/or relative density

Density at 20°C: 1.15 g/cm³ Relative density: Not determined. Relative gas density Not determined. · Particle characteristics Not applicable (liquid).

· 9.2 Other information

· Information with regard to physical hazard classes

· Corrosive to metals Void

· Other safety characteristics

Oxidising properties: none

Additional information

· Solids content: < 20 %

Solvent content:

· Water: > 80 %

SECTION 10: Stability and reactivity

- · 10.1 Reactivity see section 10.3
- 10.2 Chemical stability Stable at ambient temperature (room temperature).
- · 10.3 Possibility of hazardous reactions No further relevant information available.
- 10.4 Conditions to avoid Strong heating (decomposition)
- 10.5 Incompatible materials: No further relevant information available.

(Contd. on page 5)

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

Product name: KS527 - 1N Zinc Acetate

· 10.6 Hazardous decomposition products: see section 5

(Contd. of page 4)

SECTION 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.
- · LD/LC50 values that are relevant for classification:

The following statements refer to the individual components.

CAS: 5970-45-6 zinc acetate, dihydrate

Oral LD50 794 mg/kg (rat) (RTECS)

- · Skin corrosion/irritation Based on available data, the classification criteria are not met.
- · Serious eye damage/irritation Causes serious eye irritation.
- · Respiratory or skin 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 (specific target organ toxicity) -single exposure Based on available data, the classification criteria are not met.
- · STOT (specific target organ toxicity) -repeated exposure Based on available data, the classification criteria are not met.
- · Aspiration hazard Based on available data, the classification criteria are not met.
- · Additional toxicological information:

CAS: 5970-45-6 zinc acetate, dihydrate

. (source: GESTIS)

Acute: Irritant to corrosive effect on the eye, irritation of the skin, no further substance-specific information. In analogy to comparable water-soluble zinc salts: Impairment of taste, local damage in the digestive tract with gastrointestinal disorders. Chronic: In analogy to comparable zinc compounds: Gastrointestinal irritation, disturbances of copper homeostasis and consequences of copper deficiency with changes in haematological and clinical-chemical parameters.

- · 11.2 Information on other hazards
- · Endocrine disrupting properties The product does not contain substances with endocrine disrupting properties.
- · Other information

According to the information available to us, the chemical, physical and toxicological properties of the substances mentioned in Chapter 3 have not been thoroughly investigated.

SECTION 12: Ecological information

- · 12.1 Toxicity
- · Aquatic toxicity:

CAS: 5970-45-6 zinc acetate, dihydrate

LC50 0.55 mg/l/96h (fish)

Other information:

Toxic for fish:

Zn > 0.1 mg/l

- · 12.2 Persistence and degradability No further relevant information available.
- 12.3 Bioaccumulative potential No further relevant information available.
- 12.4 Mobility in soil No further relevant information available.
- · 12.5 Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be persistent, bioaccumulative and toxic (PBT) or very persistent and very bioaccumulative (vPvB), according to the criteria given in Annex XIII of Regulation (EC) No. 1907/2006.

- 12.6 Endocrine disrupting properties The product does not contain substances with endocrine disrupting properties.
- 12.7 Other adverse effects Avoid transfer into the environment.
- · Water hazard:

Do not allow product to reach ground water, water bodies or sewage system, even in small quantities.

Danger to drinking water if even extremely small quantities leak into soil.

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

Product name: KS527 - 1N Zinc Acetate

(Contd. of page 5)

SECTION 13: Disposal considerations

- · 13.1 Waste treatment methods
- · Recommendation

Must not be disposed of together with household garbage. Do not allow product to reach sewage system. Hand over to disposers of hazardous waste.

European waste catalogue

16 05 08* discarded organic chemicals consisting of or containing hazardous substances

· Uncleaned packagings:

· Stowage Category

instruments

14.7 Maritime transport in bulk according to IMO

- Recommendation: Disposal must be made according to official regulations.
- · Recommended cleaning agent: Water, if necessary with cleaning agent.

SECTION 14: Transport information			
· 14.1 UN number or ID number · ADR, IMDG, IATA	UN3082		
· 14.2 UN proper shipping name · ADR	3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (zinc acetate, dihydrate)		
·IMDG	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (zinc acetate, dihydrate), MARINE POLLUTANT		
· IATA	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (zinc acetate, dihydrate)		
· 14.3 Transport hazard class(es)			
· ADR			
1 1 1 2 2 2 2 3 3 3 3 3 3 3 3 3 3			
· Class · Label	9 (M6) Miscellaneous dangerous substances and articles.		
· IMDG, IATA			
· Class · Label	9 Miscellaneous dangerous substances and articles.9		
· 14.4 Packing group · ADR, IMDG, IATA	III		
14.5 Environmental hazards:	Owner of (Fight and Area)		
· Marine pollutant: · Special marking (ADR):	Symbol (fish and tree) Symbol (fish and tree)		
Special marking (IATA):	Symbol (fish and tree)		
14.6 Special precautions for user	Warning: Miscellaneous dangerous substances and articles.		
· Kemler Number: · EMS Number:	902 F-A,S-F		
· Segregation groups	(SGG7) Heavy metals and their salts (including their organometallic compounds)		
01			

Α

Not applicable.

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

Product name: KS527 - 1N Zinc Acetate

(Contd. of page 6)

· Transport/Additional information:

· ADR

Limited quantities (LQ) 5L

Excepted quantities (EQ) Code: E1

Maximum net quantity per inner packaging: 30 ml

Maximum net quantity per outer packaging: 1000 ml

· Transport category 3 · Tunnel restriction code E

·IMDG

Limited quantities (LQ) 5L Excepted quantities (EQ) Code: E1

Maximum net quantity per inner packaging: 30 ml Maximum net quantity per outer packaging: 1000 ml

SECTION 15: Regulatory information

- 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture
- · Poisons Act UK
- · Regulated explosives precursors

None of the ingredients is listed.

- · Regulated poisons
- None of the ingredients is listed.
- · Reportable explosives precursors

None of the ingredients is listed.

- · Reportable poisons
- None of the ingredients is listed.
- · Regulation (EU) 2019/1148 on the marketing and use of explosives precursors not regulated
- Regulation (EU) No 649/2012 concerning the export and import of hazardous chemicals (PIC)

None of the ingredients is listed.

Regulation (EC) No 1334/2000 setting up a Community regime for the control of exports of dual-use items and technology:

None of the ingredients is listed.

Regulation (EC) No 273/2004 on drug precursors

None of the ingredients is listed.

· Regulation (EC) No 111/2005 laying down rules for the monitoring of trade between the Community and third countries in drug precursors

None of the ingredients is listed.

Regulation (EC) No 1005/2009 on substances that deplete the ozone layer:

None of the ingredients is listed.

REGULATION (EU) 2019/1021 on persistent organic pollutants (POP)

None of the ingredients is listed.

· LIST OF SUBSTANCES SUBJECT TO AUTHORISATION (ANNEX XIV)

None of the ingredients is listed.

· Substances of very high concern (SVHC) according to REACH, Article 57

This product does not contain any substances of very high concern above the legal concentration limit of ≥ 0.1% (w / w).

Substances of very high concern (SVHC) according to UK REACH

This product does not contain any substances of very high concern above the legal concentration limit of ≥ 0.1% (w / w).

- · Directive 2012/18/EU (SEVESO III):
- · Named dangerous substances ANNEX I None of the ingredients is listed.
- · Seveso category E2 Hazardous to the Aquatic Environment
- · Qualifying quantity (tonnes) for the application of lower-tier requirements 200 t
- \cdot Qualifying quantity (tonnes) for the application of upper-tier requirements $500\ t$

(Contd. on page 8)

Printing date 14.11.2023 Version number 4 (replaces version 3) Revision: 14.11.2023

Product name: KS527 - 1N Zinc Acetate

(Contd. of page 7)

- · REGULATION (EC) No 1907/2006 ANNEX XVII Conditions of restriction: 3
- · Information about limitation of use: Not required.
- 15.2 Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

SECTION 16: Other information

These data are based on our present knowledge. However, they shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

This Safety Data Sheets is in compliance with Regulation (EC) No 1907/2006, Article 31 as amended by Regulation (EU)

• Training hints Provide adequate information, instruction and training for operators.

Relevant phrases

H302 Harmful if swallowed.

H319 Causes serious eye irritation.

H400 Very toxic to aquatic life.

H410 Very toxic to aquatic life with long lasting effects.

Abbreviations and acronyms:

STOT: specific target organ toxicity

SE: single exposure RE: repeated exposure

EC50: half maximal effective concentration IC50: half maximal inhibitory concentration

NOEL or NOEC: No Observed Effect Level or Concentration

ADR: Accord relatif au transport international des marchandises dangereuses par route (European Agreement Concerning the International Carriage of Dangerous

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of

Dangerous Goods by Rail)
IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonised System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic SVHC: Substances of Very High Concern vPvB: very Persistent and very Bioaccumulative

Acute Tox. 4: Acute toxicity - Category 4

Eye Irrit. 2: Serious eye damage/eye irritation - Category 2

Aquatic Acute 1: Hazardous to the aquatic environment - acute aquatic hazard – Category 1
Aquatic Chronic 1: Hazardous to the aquatic environment - long-term aquatic hazard – Category 1 Aquatic Chronic 2: Hazardous to the aquatic environment - long-term aquatic hazard – Category 2

Sources

Data arise from safety data sheets, reference works and literature.

GESTIS- Stoffdatenbank (Substance Database, Germany)

* Data compared to the previous version altered.