Lovibond® Water Testing

Tintometer® Group



Safety Data Sheet acc. to OSHA HCS (HazCom 2012)

Printing date 08/14/2024 Reviewed on 08/14/2024

1 Identification

- · Product identifier
- · Trade name: EDTA
- · Catalogue number: 00512391, 512390BT, 4512390BT, 512391BT, 4512391BT, 00512399BT, SDT205
- · Application of the substance / the mixture: Reagent for water analysis
- · Manufacturer/Supplier:

Tintometer Inc. 6456 Parkland Drive Sarasota, FL 34243 USA phone: (941) 756-6410

phone: (941) 756-6410 fax: (941) 727-9654 www.lovibond.us Made in Germany

· Emergency telephone number: + 1 866 928 0789 (English, French, Spanish)

2 Hazard(s) identification

· Classification of the substance or mixture



GHS08 Health hazard

Specific Target Organ Toxicity - Repeated Exposure 2 H373 May cause damage to organs through prolonged or repeated exposure.



GHS05 Corrosion

Eye Damage 1 H318 Causes serious eye damage.



H315 Causes skin irritation.

- Skin Irritation 2
 ----Label elements
- · GHS label elements The product is classified and labeled according to the Hazard Communication Standard (HCS).
- Hazard pictograms





GHS05

- · Signal word Danger
- Hazard-determining components of labeling:

EDTA trisodium salt dihydrate

· Hazard statements

H315 Causes skin irritation.

H318 Causes serious eye damage.

H373 May cause damage to organs through prolonged or repeated exposure.

· Precautionary statements

P280 Wear protective gloves/protective clothing/eye protection.

P305+P351+P338 If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

Continue rinsing.

P310 Immediately call a poison center/doctor.

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P302+P352 If on skin: Wash with plenty of water.

· Other hazards No further relevant information available.

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10%

3 Composition/information on ingredients

- · Chemical characterization: Mixtures
- · Description: Mixture of organic and inorganic compounds
- Composition and Information on Ingredients:

Percent ranges are used due to the confidential product information.

CAS: 150-38-9
EINECS: 205-758-8
Specific Target Organ Toxicity - Repeated Exposure 2, H373; Eye Damage 1, H318; Acute Toxicity - Oral 4, H302; Acute Toxicity - Inhalation 4, H332; Skin Irritation 2, H315; Specific Target Organ Toxicity - Single Exposure 3, H335

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

4 First-aid measures

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

Immediately 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.

Call a doctor immediately.

After swallowing:

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

If symptoms persist consult doctor.

· Most important symptoms and effects, both acute and delayed

strong eye irritation

irritations

after swallowing of large amounts:

thirst

sickness

vomiting

cardiovascular disorders

disorder of electrolyte balance

· Danger:

Danger of disturbed cardiac rhythm.

Risk of serious damage to eyes.

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

5 Fire-fighting measures

- · Extinguishing media
- · Suitable extinguishing agents: Use fire fighting measures that suit the environment.
- · 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.

In case of fire, the following can be released:

Hydrogen chloride (HCI)

Nitrogen oxides (NOx)

Potassium oxide

- Advice for firefighters
- **Protective equipment:**

Wear self-contained respiratory protective device.

Wear fully protective suit.

· Additional information

Collect contaminated fire fighting water separately. It must not enter the sewage system.

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

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Ambient fire may liberate hazardous vapours.

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6 Accidental release measures

- Personal precautions, protective equipment and emergency procedures
- Advice for non-emergency personnel: Wear protective equipment. Keep unprotected persons away.
- · Advice for emergency responders: Protective equipment: see section 8
- · Environmental precautions: Do not allow product to reach sewage system or any water course.
- · Methods and material for containment and cleaning up:

Ensure adequate ventilation.

Pick up mechanically.

Dispose contaminated material as waste according to section 13.

Reference to other sections

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

7 Handling and storage

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

Avoid contact with the skin.

Avoid contact with the eyes.

Take off immediately all contaminated clothing.

Wash hands before breaks and at the end of work.

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

- · Conditions for safe storage, including any incompatibilities
- · Requirements to be met by storerooms and receptacles: Store in a cool location.
- · Information about storage in one common storage facility:

Do not store together with acids.

Store away from oxidizing agents.

Further information about storage conditions:

Protect from heat and direct sunlight.

Protect from exposure to the light.

Store in dry conditions.

Protect from humidity and water.

- Recommended storage temperature: 20°C +/- 5°C (approx. 68°F)
- · Specific end use(s) No further relevant information available.

8 Exposure controls/personal protection

- · 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.

- · Additional information: The lists that were valid during the creation were used as basis.
- · Engineering measures:

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

Personal protective equipment:

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

- · Breathing equipment: Use respiratory protective device against the effects of fume/dust/aerosol.
- Recommended filter device for short term use: Filter P2
- · Protection of hands:

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

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(Contd. of page 3) Recommended thickness of the material: ≥ 0.11 mm

Penetration time of glove material

Value for the permeation: Level \leq 1 (10 min)

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

• Eye protection: Safety glasses

Use protective goggles that have been tested and approved in accordance with government standards (like NIOSH).

· Body protection: Protective work clothing

· Limitation and supervision of exposure into the environment:

Do not allow product to reach sewage system or any water course.

9 Physical and chemical properties

· Information on basic physical and chemical properties

· Appearance:

Form / Physical state:
Color:
Odor:
Odorless
Odor threshold:
Not applicable.

• pH-value (13 g/l) at 20°C (68°F): 9.2

• Melting point/freezing point: >300°C (>572°F) (CAS 150-38-9)

Initial boiling point and boiling range: Not determined. Flash point: Not applicable.

· Flammability (solid, gas): The product is not combustible.

Auto igniting: Not applicable.Decomposition temperature: Not determined.

· **Auto-ignition temperature:** Product is not self-igniting.

• Danger of explosion: Product does not present an explosion hazard.

Flammability or explosive limits:

Lower: Not applicable.
Upper: Not applicable.

· Oxidizing properties: none

· Vapor Pressure: Not applicable.

Density at 20°C (68°F): ~1.95 g/cm³ (~16.27 lbs/gal)

Relative density: Not determined.
Vapor density: Not applicable.
Evaporation rate: Not applicable.

· Solubility(ies)

Water: Soluble.

· Partition coefficient (n-octanol/water): Not applicable (mixture).

· Viscosity:

· **Kinematic:** Not applicable (solid).

· Other information

· Solids content: 100 %

· Information with regard to physical hazard classes

Corrosive to metals Based on available data, the classification criteria are not met.

10 Stability and reactivity

- · Reactivity see section "Possibility of hazardous reactions"
- · Chemical stability Stable at ambient temperature (room temperature).
- · Possibility of hazardous reactions

Reacts with acids.

Reacts with oxidizing agents.

- --> Forms heat.
- · Conditions to avoid Strong heating (decomposition)
- · Incompatible materials: No further relevant information available.

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· Hazardous decomposition products: see section 5

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11 Toxicological information

- · Information on toxicological effects
- · Acute toxicity: Based on available data, the classification criteria are not met.

· LD/LC50 values that are relevant for classification:

CAS: 150-38-9 EDTA trisodium salt dihydrate

Oral LD50 1780-<2000 mg/kg (rat)

(ECHA: read across CAS 64-02-8 / c=1780 mg/kg male / c=1913 mg/kg female)

Inhalative LC50/4h 1.5 mg/l (ATE)

- · Primary irritant effect:
- · on the skin: Causes skin irritation.
- · on the eye:

Causes serious eye damage.

Risk of corneal clouding.

- · Sensitization: Based on available data, the classification criteria are not met.
- · Carcinogenic categories
- IARC (International Agency for Research on Cancer)

None of the ingredients is listed.

NTP (National Toxicology Program)

None of the ingredients is listed.

· OSHA-Ca (Occupational Safety & Health Administration)

None of the ingredients is listed.

- · Other information: see section 8 / 15
- · Synergistic Products: None
- · CMR effects (carcinogenity, mutagenicity and toxicity for reproduction): The following statements refer to the mixture:
- 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

May cause damage to organs through prolonged or repeated exposure.

· Aspiration hazard Based on available data, the classification criteria are not met.

12 Ecological information

- · Toxicity
- · Aquatic toxicity: No further relevant information available.
- · Persistence and degradability No further relevant information available.
- · Bioaccumulative potential No further relevant information available.
- · Mobility in soil No further relevant information available.
- Other adverse effects Avoid transfer into the environment.

13 Disposal considerations

- · Waste treatment methods
- · Recommendation:

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

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- · Uncleaned packagings:
- · Recommendation: Disposal must be made according to official regulations.

14 Transport information

· UN-Number · DOT, IMDG, IATA	none
· UN proper shipping name · DOT, IMDG, IATA	none
· Transport hazard class(es)	
· DOT, IMDG, IATA · Class	none
Packing group	
· DOT, IMDG, IATA	none
· Environmental hazards:	Not applicable.
· Special precautions for user	Not applicable.
Transport in bulk according to Annex II of MARPOL73/7 and the IBC Code	8 Not applicable.

Not dangerous according to the above specifications.

15 Regulatory information

· Transport/Additional information:

- · Safety, health and environmental regulations/legislation specific for the substance or mixture
- · Sara
- · Section 355 (Extremely hazardous substances):

None of the ingredients is listed.

· Section 313 (Specific toxic chemical listings):

None of the ingredients is listed.

· TSCA (Toxic Substances Control Act):

All components have the value ACTIVE.

· Hazardous Air Pollutants

None of the ingredients is listed.

- · Proposition 65
- · Chemicals known to cause cancer:

None of the ingredients is listed.

· Chemicals known to cause reproductive toxicity for females:

None of the ingredients is listed.

· Chemicals known to cause reproductive toxicity for males:

None of the ingredients is listed.

· Chemicals known to cause developmental toxicity:

None of the ingredients is listed.

New Jersey Right-to-Know List:

None of the ingredients is listed.

· New Jersey Special Hazardous Substance List:

None of the ingredients is listed.

Pennsylvania Right-to-Know List:

None of the ingredients is listed.

· Pennsylvania Special Hazardous Substance List:

None of the ingredients is listed.

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EPA (Environmental Protection Agency)

None of the ingredients is listed.

NIOSH-Ca (National Institute for Occupational Safety and Health)

None of the ingredients is listed.

· Information about limitation of use:

Observe national regulations where applicable:

Employment restrictions concerning young persons must be observed.

· Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

Relevant phrases

H302 Harmful if swallowed.

H315 Causes skin irritation.

H318 Causes serious eye damage.

H332 Harmful if inhaled.

H335 May cause respiratory irritation.

H373 May cause damage to organs through prolonged or repeated exposure.

· Version number / date of revision: 9 / 08/14/2024

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

ACGIH® - American Conference of Governmental Industrial Hygienists

•A1 - Confirmed human carcinogen

•A2 - Suspected human carcinogen

•A3 - Confirmed animal carcinogen with unknown relevance to humans

•A4 - Not classifiable as a human carcinogen

•A5 - Not suspected as a human carcinogen

IARC - International Agency for Research on Cancer
•Group 1 - Carcinogenic to humans

•Group 2A - Probably carcinogenic to humans

•Group 2B - Possibly carcinogenic to humans

•Group 3 - Not classifiable as to carcinogenicity to humans
•Group 4 - Probably not carcinogenic to humans
NTP - National Toxicology Program, U.S. Department of Health and Human Services

•Group K - Known to be Human Carcinogens

•Group R - Reasonably Anticipated to be Human Carcinogens

IMDG: International Maritime Code for Dangerous Goods DOT: US Department of Transportation

IATA: International Air Transport Association

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

NIOSH: National Institute for Occupational Safety

OSHA: Occupational Safety & Health

TLV: Threshold Limit Value

PEL: Permissible Exposure Limit REL: Recommended Exposure Limit

Acute Toxicity - Oral 4: Acute toxicity - Category 4

Skin Irritation 2: Skin corrosion/irritation – Category 2

Eye Damage 1: Serious eye damage/eye irritation - Category 1

Specific Target Organ Toxicity - Single Exposure 3: Specific target organ toxicity (single exposure) – Category 3
Specific Target Organ Toxicity - Repeated Exposure 2: Specific target organ toxicity (repeated exposure) – Category 2

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

ECHA: European CHemicals Agency http://echa.europa.eu

* Data compared to the previous version altered.