

Material Safety Data Sheet

acc. to ISO/DIS 11014

Printing date 06/02/2009

Reviewed on 01/26/2009

1 Identification of substance:

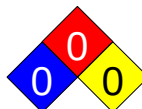
- **Product details:**
- **Trade name:** **Oligonucleotide Calibration Standard**
- **Application of the substance / the preparation** Laboratory chemicals
- **Manufacturer/Supplier:**
Bruker Daltonik GmbH
Fahrenheitstrasse 4
D-28359 Bremen / Germany
Tel.: +49(421) 2205-0
Fax : +49(421) 2205-100
E-mail: care@bdal.de
- **Information department:**
Bruker Daltonik GmbH
Tel.: +49 (421) 2205-240

2 Composition/Data on components:

- **Chemical characterization**
- **Description:** Lyophilized mixture of Oligonukleotide
- **Additional information** Warning - substances not yet fully tested

3 Hazards identification

- **Hazard description:** not applicable
- **Information pertaining to particular dangers for man and environment**
The product does not have to be labelled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.
- **Classification system**
- **NFPA ratings (scale 0-4)**



Health = 0
Fire = 0
Reactivity = 0

4 First aid measures

- **General information** Immediately remove any clothing soiled by the product.
- **After inhalation**
Take affected persons into fresh air and keep quiet.
Seek medical treatment in case of complaints.
- **After skin contact** Immediately wash with water and soap and rinse thoroughly.
- **After eye contact**
Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor.
- **After swallowing**
Rinse the mouth with water immediately
Do not induce vomiting; immediately call for medical help.
- **Information for doctor** No particular measures are known - treat according to symptoms.

5 Fire fighting measures

- **Suitable extinguishing agents** Use fire fighting measures that suit the environment.
- **For safety reasons unsuitable extinguishing agents** Water with full jet.
- **Special hazards caused by the material, its products of combustion or resulting gases:**
Formation of toxic gases is possible during heating or in case of fire.

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- **Protective equipment:** Wear self-contained respiratory protective device.
- **Additional information**
Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

6 Accidental release measures

- **Person-related safety precautions:**
Ensure adequate ventilation
Wear protective equipment. Keep unprotected persons away.
- **Measures for environmental protection:**
Do not allow product to reach sewage system or any water course.
Do not allow to penetrate the ground/soil.
- **Measures for cleaning/collecting:**
Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).
- **Additional information:**
See Section 13 for disposal information.
See Section 8 for information on personal protection equipment.

7 Handling and storage

- **Handling**
- **Information for safe handling:**
Ensure good ventilation/exhaustion at the workplace.
Avoid contact with the eyes and skin.
Keep eye irrigation utensils (bottle) ready for use at place of work.
- **Information about protection against explosions and fires:** No special measures required.
- **Storage**
- **Requirements to be met by storerooms and receptacles:** Store only in the original receptacle.
- **Information about storage in one common storage facility:** Store away from foodstuffs.
- **Further information about storage conditions:** Protect from frost.

8 Exposure controls and personal protection

- **Additional information about design of technical systems:** No further data; see item 7.
- **Components with limit values that require monitoring at the workplace:** Not required.
- **Additional information:** The lists that were valid during the creation were used as basis.
- **Personal protective equipment**
- **General protective and hygienic measures**
The usual precautionary measures for handling chemicals should be followed.
Keep away from foodstuffs, beverages and feed.
Wash hands before breaks and at the end of work.
- **Breathing equipment:** Not necessary if room is well-ventilated.
- **Protection of hands:**



Protective gloves.

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

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Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

- **Material of gloves**

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

- **Penetration time of glove material**

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

- **As protection from splashes gloves made of the following materials are suitable:** PVC gloves

- **Not suitable are gloves made of the following materials:**

Strong gloves

Leather gloves

- **Eye protection:**



Tightly sealed goggles.

- **Body protection:** Protective work clothing.

9 Physical and chemical properties:

- **General Information**

Form:	Liquid
Color:	Various colors
Odor:	Odorless

- **Change in condition**

Melting point/Melting range: 0°C (32°F)

Boiling point/Boiling range: 100°C (212°F)

- **Flash point:** Not applicable

- **Auto igniting:** Product is not selfigniting.

- **Danger of explosion:** Product does not present an explosion hazard.

- **Density:** Not determined

- **Solubility in / Miscibility with**

Water:	Soluble
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10 Stability and reactivity

- **Thermal decomposition / conditions to be avoided:**

No decomposition if used according to specifications.

- **Materials to be avoided:**

acids

Alkali

oxidizing agents

- **Dangerous reactions** none, if used as directed

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· **Dangerous products of decomposition:** Danger of toxic pyrolysis products

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11 Toxicological information

- **Acute toxicity:**
- **Primary irritant effect:**
- **on the skin:** Irritant to skin and mucous membranes.
- **on the eye:** Irritating effect.
- **Sensitization:** No sensitizing effects known.
- **Additional toxicological information:**
The product is not subject to classification according to the calculation method of the General EU Classification Guidelines for Preparations as issued in the latest version:
The product is a preparation, for which no experimentally determined toxicity data are available.

12 Ecological information:

- **Ecotoxicological effects:** Not determined
- **General notes:**
Water hazard class 1 (German Regulation) (Self-assessment): slightly hazardous for water.
Do not allow product to reach ground water, water course or sewage system.

13 Disposal considerations

- **Product:**
- **Recommendation** For disposal, local regulations issued by the authorities must be observed.
- **Uncleaned packagings:**
- **Recommendation:** Disposal must be made according to official regulations.

14 Transport information

- | |
|---|
| <ul style="list-style-type: none"> · DOT regulations: · Hazard class: - |
| <ul style="list-style-type: none"> · Land transport ADR/RID (cross-border) · ADR/RID class: - |
| <ul style="list-style-type: none"> · Maritime transport IMDG: · IMDG Class: - |
| <ul style="list-style-type: none"> · Air transport ICAO-TI and IATA-DGR: · ICAO/IATA Class: - |
- **Transport/Additional information:** Not dangerous according to the above specifications.

15 Regulations

- **Carcinogenicity categories**
- **EPA (Environmental Protection Agency)**
Substance is not listed.

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· **IARC (International Agency for Research on Cancer)**

Substance is not listed.

· **NTP (National Toxicology Program)**

Substance is not listed.

· **TLV (Threshold Limit Value established by ACGIH)**

Substance is not listed.

· **MAK (German Maximum Workplace Concentration)**

Substance is not listed.

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

Substance is not listed.

· **OSHA-Ca (Occupational Safety & Health Administration)**

Substance is not listed.

· **Markings according to EU guidelines:**

Observe the general safety regulations when handling chemicals

· **Special labeling of certain preparations:** Warning - contains substances not yet fully tested

· **National regulations**

· **Water hazard class:** Water hazard class 1 (Self-assessment): slightly hazardous for water.

· **Sara**

· **Section 355 (Extremely hazardous substances):**

Substance is not listed.

· **Section 313 (Specific toxic chemical listings):**

Substance is not listed.

· **TSCA (Toxic Substances Control Act):**

Substance is listed.

· **Chemicals known to cause cancer:**

Substance is not listed.

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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. Changes made since last issue dated 26.01.2009 at the following points: *

· **Department issuing MSDS:**

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Bismarckstraße 10

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· **Contact:**

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