

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

Identification of the substance or mixture

Product code 10503027
Product name DNAzol® Reagent

Company/undertaking identification

Life Technologies
 5791 Van Allen Way
 PO Box 6482
 Carlsbad, CA 92008
 +1 760 603 7200

Life Technologies
 5250 Mainway Drive
 Burlington, ONT
 CANADA L7L 6A4
 800/263-6236

24 hour Emergency Response:

866-536-0631
 301-431-8585
 Outside of the U.S. +1-301-431-8585

Country specific Emergency Number (if available):

CHEMTREC Brazil (Rio De Janeiro) +(55)-2139581449 (português)

For research use only. Not intended for human or animal diagnostic or therapeutic uses.

SECTION 2: Hazards identification

GHS - Classification

Signal Word

WARNING



Health hazards

| | |
|---------------------------|------------|
| Skin corrosion/irritation | Category 3 |
|---------------------------|------------|

Physical hazards

| | |
|-------------------------------------|-------------------|
| GHS Physical Hazard 1 | Flammable liquids |
| GHS Physical Hazard Category Number | Category 4 |

Hazard Statements

H227 - Combustible liquid

H316 - Causes mild skin irritation

Precautionary Statements

P370 + P378 - In case of fire, use water/water spray/water jet/carbon dioxide/sand/foam/alcohol resistant foam/chemical powder for extinction

P210 - Keep away from heat/sparks/open flames/hot surfaces. - No smoking

P332 + P313 - If skin irritation occurs: Get medical advice/attention

P280 - Wear protective gloves/protective clothing/eye protection/face protection

Principle Routes of Exposure

Potential Health Effects

eyes May cause eye irritation with susceptible persons.
Skin Mild skin irritation.
inhalation May cause irritation of respiratory tract.
Ingestion Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.

Specific effects

Carcinogenic effects None.
Mutagenic effects None.
Reproductive toxicity None.
Sensitization None.

Target Organ Effects No known effects under normal use conditions.

HMIS

| | |
|--------------|---|
| Health | 1 |
| Flammability | 2 |
| Reactivity | 0 |

SECTION 3: Composition/information on ingredients

| Chemical Name | CAS-No | EINECS-No | Weight % |
|--------------------------|----------|-----------|----------|
| Guanidine isothiocyanate | 593-84-0 | 209-812-1 | 40-70 |

Contact with acids or bleach liberates toxic gases. DO NOT ADD acids or bleach to any liquid wastes containing this product. We recommend handling all chemicals with caution.

SECTION 4: First aid measures

Skin contact Wash off immediately with plenty of water. Take off contaminated clothing.
Eye contact Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.
Ingestion Never give anything by mouth to an unconscious person.
inhalation Remove to fresh air.
Most important symptoms and effects, both acute and delayed
H227 - Combustible liquid, H316 - Causes mild skin irritation

Notes to Physician Treat symptomatically.

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SECTION 5: Firefighting measures

| | |
|--|---|
| Suitable extinguishing media | Water spray, carbon dioxide (CO ₂), dry chemical, alcohol-resistant foam. |
| Special protective equipment for firefighters | Wear self-contained breathing apparatus and protective suit. |
| Specific hazards arising from the chemical | Not known |
| Australia HazChem Code | 2YE |

SECTION 6: Accidental release measures

| | |
|--------------------------------|--|
| Personal precautions | Remove all sources of ignition. |
| Methods for cleaning up | Soak up with inert absorbent material. |

Environmental precautions

Prevent further leakage or spillage if safe to do so.

See Section 12 for more information.

SECTION 7: Handling and storage

| | |
|-----------------|--|
| Handling | Always wear recommended Personal Protective Equipment. Keep away from heat, sparks and open flame. Ensure adequate ventilation. |
| Storage | Keep container tightly closed in a dry and well-ventilated place. Keep away from heat, sparks, flame and other sources of ignition (i.e., pilot lights, electric motors and static electricity). |

SECTION 8: Exposure controls/personal protection

Exposure Limits

| Chemical Name | OSHA PEL | OSHA PEL (Ceiling) | ACGIH OEL (TWA) | ACGIH OEL (STEL) |
|--------------------------|----------|--------------------|-----------------|------------------|
| Guanidine isothiocyanate | None | None | None | None |

Engineering measures Ensure adequate ventilation, especially in confined areas.

Personal Protective Equipment

Personal Protective Equipment requirements are dependent on the user institution's risk assessment and are specific to the risk assessment for each laboratory where this material may be used.

Respiratory protection In case of insufficient ventilation, wear suitable respiratory equipment.

Hand protection Impervious gloves.

Eye protection Wear safety glasses with side shields (or goggles).

Skin and Body Protection Lightweight protective clothing.

Hygiene measures Handle in accordance with good industrial hygiene and safety practice.

Environmental exposure controls Prevent product from entering drains.

SECTION 9: Physical and chemical properties

General information

| | | |
|---|-----------------------------|----------------------|
| Form | Liquid | |
| Appearance | No information available | |
| Odor | Mixture has not been tested | |
| Odor Threshold | Mixture has not been tested | |
| Boiling point / boiling range | °C No data available | °F No data available |
| Melting point / melting range | °C No data available | °F No data available |
| flash point | °C 67 | °F 152.6 |
| Autoignition Temperature | °C No data available | °F No data available |
| Evaporation rate | No data available | |
| Flammability (solid, gas) | No data available | |
| Oxidizing properties | Mixture has not been tested | |
| Water solubility | soluble | |
| Upper explosion limit | No data available | |
| Lower explosion limit | No data available | |
| Partition coefficient: n-octanol/water | No data available | |
| Vapor Pressure | No data available | |
| vapor density | No data available | |
| Viscosity | Mixture has not been tested | |
| pH value | 8.5 | |

SECTION 10: Stability and reactivity

| | |
|---|--|
| Stability | Stable under normal conditions. |
| Materials to avoid | Contact with acids or bleach liberates toxic gases. DO NOT ADD acids or bleach to any liquid wastes containing this product. |
| Possibility of hazardous reactions | Hazardous reaction has not been reported |
| Hazardous decomposition products | Carbon monoxide. Carbon dioxide (CO ₂). Nitrogen oxides (NO _x). Cyanide compounds. Sulphur oxides. |
| polymerization | Hazardous polymerization does not occur. |
| Conditions to avoid | None under normal processing. |

SECTION 11: Toxicological information

Acute Toxicity

| Chemical Name | LD50 (oral, rat/mouse) | LD50 (dermal, rat/rabbit) | LC50 (inhalation, rat/mouse) |
|--------------------------|------------------------|---------------------------|------------------------------|
| Guanidine isothiocyanate | 764mg/kg | 2000 mg/kg | 5.319 mg/L (4H) |

Principle Routes of Exposure**Potential Health Effects**

| | |
|------------------------------|---|
| eyes | May cause eye irritation with susceptible persons. |
| Skin | Mild skin irritation. |
| inhalation | May cause irritation of respiratory tract. |
| Ingestion | Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea. |
| Carcinogenic effects | None. |
| Mutagenic effects | None. |
| Reproductive toxicity | None. |
| Sensitization | None. |
| Target Organ Effects | No known effects under normal use conditions |

SECTION 12: Ecological information

| | |
|------------------------|--|
| Ecotoxicity | Contains no substances known to be hazardous to the environment or not degradable in waste water treatment plants. |
| Mobility | No information available. |
| Biodegradation | No information available. |
| Bioaccumulation | No information available. |

SECTION 13: Disposal considerations

Dispose of contents/containers in accordance with local regulations.

SECTION 14: Transport information**IATA**

| | |
|------------------------------|---|
| Proper Shipping Name | No dangerous good in sense of these transport regulations |
| Hazard Class | None |
| Subsidiary class | None |
| Packing group | None |
| UN-No | None |
| Environmental hazards | None |

SECTION 15: Regulatory information

| Component | US TSCA |
|--|---------|
| Guanidine isothiocyanate 593-84-0 (40-70) | Listed |

US Federal Regulations**SARA 313**

This product is not regulated by SARA.

Clean Air Act, Section 112 Hazardous Air Pollutants (HAPs) (see 40 CFR 61)

This product does not contains HAPs.

US State Regulations

| Chemical Name | Massachusetts - RTK | New Jersey - RTK | Pennsylvania - RTK | Illinois - RTK | Rhode Island - RTK |
|--------------------------|---------------------|------------------|--------------------|----------------|--------------------|
| Guanidine isothiocyanate | - | - | - | - | - |

California Proposition 65

This product does not contain any Proposition 65 chemicals.

WHMIS Hazard Class

B3 - Combustible liquid



This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the MSDS contains all the information required by the CPR.

SECTION 16: Other information

Reason for revision SDS sections updated.

For research use only.

"The above information was acquired by diligent search and/or investigation and the recommendations are based on prudent application of professional judgment. The information shall not be taken as being all inclusive and is to be used only as a guide. All materials and mixtures may present unknown hazards and should be used with caution. Since the Company cannot control the actual methods, volumes, or conditions of use, the Company shall not be held liable for any damages or losses resulting from the handling or from contact with the product as described herein. THE INFORMATION IN THIS SDS DOES NOT CONSTITUTE A WARRENTY, EXPRESSED OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PUPOSE"

End of Safety Data Sheet

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