# KIT SAFETY DATA SHEET



Kit Product Name Lyophilized Components Refill Pack

Kit Catalogue Number(s) 1660015, 1660015EDU

Revision date 29-Mar-2022

# **Kit Contents**

Catalogue Number(s)	Product Name
1660407, 1660407EDU, 9702928	Ampicillin, lyophilized
1660406, 1660406EDU, 9702997	Arabinose Lyophilized
1660412, 1660412EDU, 10011390	LB Broth, Capsules
9702999	Lysozyme Lyophilized

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# **SAFETY DATA SHEET**

Revision date 24-Feb-2021 Revision Number 1

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

Product identifier

Product Name Ampicillin, lyophilized

Catalogue Number(s) 1660407, 1660407EDU, 9702928

Other means of identification

**CAS No** 69-52-3

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of the supplier of the safety data sheet

Corporate HeadquartersManufacturerLegal Entity / Contact AddressBio-Rad Laboratories Inc.Bio-Rad Laboratories, Life Science GroupBio-Rad Laboratories Pty Ltd1000 Alfred Nobel Drive2000 Alfred Nobel Drive189 Bush Road

Hercules, CA 94547 Hercules, California 94547 Albany Auckland USA USA New Zealand

**Technical Service** +64 9 415 2280 or 0508 805 500

sales.nz@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC New Zealand: 64-98010034

## **SECTION 2: Hazards identification**

## GHS Classification

Respiratory sensitisation	Category 1 (HSNO - 6.5A)
Skin sensitisation	Category 1A

## Label elements



# **Signal word** Danger

#### **Hazard statements**

H317 - May cause an allergic skin reaction

H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled

#### **Precautionary Statements - Prevention**

Avoid breathing dust/fume/gas/mist/vapours/spray
In case of inadequate ventilation wear respiratory protection
Contaminated work clothing should not be allowed out of the workplace
Wear protective gloves/protective clothing/eye protection/face protection

## **Precautionary Statements - Response**

#### Skin

IF ON SKIN: Wash with plenty of water and soap
If skin irritation or rash occurs: Get medical advice/attention
Take off all contaminated clothing and wash it before reuse

#### Inhalation

IF INHALED: Remove person to fresh air and keep comfortable for breathing If experiencing respiratory symptoms: Call a POISON CENTER or doctor

#### **Precautionary Statements - Disposal**

Dispose of contents/container in accordance with local, regional, national, and international regulations as applicable

## Other hazards which do not result in classification

# SECTION 3: Composition/information on ingredients

Chemical name	CAS No	Weight-%
Sodium	69-52-3	50 - 100
[2S-[2.alpha.,5.alpha.,6.beta.(S*)]]-6-(aminophen		
ylacetamido)-3,3-dimethyl-7-oxo-4-thia-1-azabicy		
clo[3.2.0]heptane-2-carboxylate		

## **SECTION 4: First aid measures**

#### Description of first aid measures

**General advice** Show this safety data sheet to the doctor in attendance.

**Inhalation** May cause allergic respiratory reaction. If breathing has stopped, give artificial respiration.

Get medical attention immediately. Remove to fresh air. Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation. Get immediate medical advice/attention.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash with soap and water. May cause an allergic skin reaction. In the case of skin irritation

or allergic reactions see a doctor.

Ingestion May produce an allergic reaction. Do NOT induce vomiting. Clean mouth with water and

drink afterwards plenty of water. Never give anything by mouth to an unconscious person.

Get immediate medical advice/attention.

Self-protection of the first aider Ensure that medical personnel are aware of the material(s) involved, take precautions to

protect themselves and prevent spread of contamination. Avoid contact with skin, eyes or clothing. Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation. Use personal protective equipment as required. See section 8 for more information.

# Most important symptoms and effects, both acute and delayed

Symptoms May cause allergy or asthma symptoms or breathing difficulties if inhaled. Coughing and/ or

wheezing. Itching. Rashes. Hives.

## Indication of any immediate medical attention and special treatment needed

May cause sensitisation in susceptible persons. Treat symptomatically. Note to doctors

# SECTION 5: Firefighting measures

**Suitable Extinguishing Media** 

Suitable Extinguishing Media Use extinguishing measures that are appropriate to local circumstances and the

surrounding environment.

Unsuitable extinguishing media No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

chemical

Product is or contains a sensitiser. May cause sensitisation by inhalation and skin contact.

May cause sensitisation by skin contact.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout

gear. Use personal protection equipment.

## SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

Personal precautions Avoid contact with skin, eyes or clothing. Ensure adequate ventilation. Use personal

protective equipment as required. Evacuate personnel to safe areas. Keep people away

from and upwind of spill/leak.

Other information Refer to protective measures listed in Sections 7 and 8.

For emergency responders Use personal protection recommended in Section 8.

**Environmental precautions** 

**Environmental precautions** Prevent further leakage or spillage if safe to do so.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

Pick up and transfer to properly labelled containers. Methods for cleaning up

Precautions to prevent secondary hazards

Clean contaminated objects and areas thoroughly observing environmental regulations. Prevention of secondary hazards

# SECTION 7: Handling and storage

### Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Avoid contact with

skin, eyes or clothing. Ensure adequate ventilation. Provide extract ventilation to points where emissions occur. In case of insufficient ventilation, wear suitable respiratory equipment. Do not eat, drink or smoke when using this product. Remove contaminated

clothing and shoes. Take off contaminated clothing and wash it before reuse.

General hygiene considerations Avoid contact with skin, eyes or clothing. Wear suitable gloves and eye/face protection. Do

not eat, drink or smoke when using this product. Remove and wash contaminated clothing

and gloves, including the inside, before re-use.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep containers tightly closed in a dry, cool and well-ventilated place. Store locked up.

Keep out of the reach of children. Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

Control parameters

Exposure Limits This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

**Biological occupational exposure** 

limits

This product, as supplied, does not contain any hazardous materials with biological limits

established by the region specific regulatory bodies.

Appropriate engineering controls

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

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

**Hand protection** Wear suitable gloves.

**Skin and body protection** Wear suitable protective clothing.

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

## SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical stateSolidAppearancecrystallineColourlight yellowOdourOdourless.

Odour threshold No information available

Property Values Remarks • Method

H None known

Melting point / freezing point 240 °C

Boiling point / boiling rangeNo data availableNone knownFlash pointNo data availableNone knownEvaporation rateNo data availableNone known

None known

None known

None known

None known

None known

None known

Flammability (solid, gas) No data available None known Flammability Limit in Air None known

**Upper flammability or explosive** No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubility
Solubility(ies)
Partition coefficient
No data available
No data available
No data available

Partition coefficient No data available
Autoignition temperature No data available
Decomposition temperature

Kinematic viscosity

Dynamic viscosity

Explosive properties

No data available
No data available
Not applicable.

**Explosive properties**Not applicable. **Oxidising properties**Not applicable.

Other information

Molecular weight Not applicable VOC Content (%) Not applicable

# SECTION 10: Stability and reactivity

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

**Possibility of hazardous reactions** None under normal processing.

Conditions to avoid

Conditions to avoid None known based on information supplied.

Incompatible materials

**Incompatible materials**None known based on information supplied.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

# **SECTION 11: Toxicological information**

**Acute toxicity** 

Information on likely routes of exposure

**Product Information** 

**Inhalation** Specific test data for the substance or mixture is not available. May cause sensitisation in

susceptible persons. (based on components).

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available. Repeated or prolonged skin

contact may cause allergic reactions with susceptible persons. (based on components).

May cause sensitisation by skin contact.

Ingestion Specific test data for the substance or mixture is not available. May cause additional affects

as listed under "Inhalation".

Symptoms Symptoms of allergic reaction may include rash, itching, swelling, trouble breathing, tingling

of the hands and feet, dizziness, lightheadedness, chest pain, muscle pain, or flushing.

Coughing and/ or wheezing. Itching. Rashes. Hives.

Acute toxicity

**Numerical measures of toxicity** 

**Component Information** 

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Sodium	> 5314 mg/kg (Rat)	-	-
[2S-[2.alpha.,5.alpha.,6.beta.(S*			
)]]-6-(aminophenylacetamido)-3,			
3-dimethyl-7-oxo-4-thia-1-azabi			
cyclo[3.2.0]heptane-2-carboxyla			
te			

## Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

Respiratory or skin sensitisation May cause sensitisation by skin contact

Germ cell mutagenicity Based on available data, the classification criteria are not met.

Carcinogenicity

The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical name	New Zealand	IARC
Sodium	-	Group 3
[2S-[2.alpha.,5.alpha.,6.beta.(S*)]]-6-(aminophenyla		
cetamido)-3,3-dimethyl-7-oxo-4-thia-1-azabicyclo[3.		
2.0]heptane-2-carboxylate - 69-52-3		

#### Legend

## IARC (International Agency for Research on Cancer)

Group 3 - Not Classifiable as to Carcinogenicity in Humans

**Reproductive toxicity** Based on available data, the classification criteria are not met.

STOT - single exposure
Respiratory irritation
Narcotic effects

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

# **SECTION 12: Ecological information**

**Ecotoxicity** 

**Ecotoxicity** The environmental impact of this product has not been fully investigated.

**Aquatic ecotoxicity** 

**Terrestrial ecotoxicty** There is no data for this product.

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** No information available.

Mobility in soil

Other adverse effects

No information available.

# SECTION 13: Disposal considerations

#### Waste treatment methods

Contaminated packaging

For packages that have been in direct contact with hazardous substances, the person must ensure that the package is rendered incapable of containing any substance. It must be disposed of in a manner that is consistent with the requirements for disposal of the substance that it contained, taking into account the material the package is manufactured from

Packages may only be reused or recycled if the package has been treated to remove any residual contents of the hazardous substance (class 1, 2, 3, 4, or 5); or the contents of the residue in the package are below the threshold for the substance to be classified as hazardous (class 6, 8, or 9 substance)

# **SECTION 14: Transport information**

IMDG Not regulated

Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

## SECTION 15: Regulatory information

Safety, health and environmental regulations/legislation specific for the substance or mixture

National regulations

**New Zealand** 

Chemical name	New Zealand HSNO Chemical Classification	
Sodium	6.3A,6.4A,6.5A,6.5B	

[2S-[2.alpha.,5.alpha.,6.beta.(S\*)]]-6-(aminophenylacetamido)-3, 3-dimethyl-7-oxo-4-thia-1-azabicyclo[3.2.0]heptane-2-carboxylat

e - 69-52-3

National regulations

See Section 8 for any applicable tolerable exposure limits and environmental exposure limits

Certified handlers, tracking and controlled substance license requirements

Certified handlers are required for some substances. This includes for substances requiring a controlled substance license, including Class 1 explosives, vertebrate toxic agents (9.3A, B, C), and certain fumigants. Class 6.1A and 6.1B substances such as pesticides also require Certified handlers. Please check the Health and Safety at Work Act 2015 for further information

Tracking is required for some highly hazardous substances. These substances need to be under the control of an appropriately trained person or appropriately secured. Please check the Health and Safety at Work Act 2015 for further information

Controlled substance licenses are required to possess certain class 1 (explosive) and class 6 (vertebrate toxic agents or fumigants) substances. See Part 7 of the Health and Safety at Work Regulation 2017 for more information

EPA New Zealand HSNO approval code or group standard

Not applicable

#### International Inventories

Contact supplier for inventory compliance status

Legend:

#### **International Regulations**

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

## **SECTION 16: Other information**

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 24-Feb-2021

**Revision Note** SDS sections updated. 1. 2.

#### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR) U.S. Environmental Protection Agency ChemView Database

U.S. Environmental Protection Agency Chemylew Databas

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### **Disclaimer**

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text

**End of Safety Data Sheet** 



# SAFETY DATA SHEET

Revision date 19-Aug-2021 Revision Number 2

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

Product identifier

Product Name Arabinose Lyophilized

Catalogue Number(s) 1660406, 1660406EDU, 9702997

Other means of identification

**CAS No** 5328-37-0

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of the supplier of the safety data sheet

<u>Corporate Headquarters</u>
Bio-Rad Laboratories Inc.

Manufacturer
Bio-Rad Laboratories, Life Science Group
Bio-Rad Laboratories Pty Ltd

1000 Alfred Nobel Drive2000 Alfred Nobel Drive189 Bush RoadHercules, CA 94547Hercules, California 94547Albany AucklandUSAUSANew Zealand

**Technical Service** +64 9 415 2280 or 0508 805 500

sales.nz@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC New Zealand: 64-98010034

## **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Other hazards which do not result in classification

## SECTION 3: Composition/information on ingredients

Chemical name	CAS No	Weight-%
L-Arabinose	5328-37-0	50 - 100

## **SECTION 4: First aid measures**

**Description of first aid measures** 

**General advice** No hazards which require special first aid measures.

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

# **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

Suitable Extinguishing Media Use extinguishing measures that are appropriate to local circumstances and the

surrounding environment.

Unsuitable extinguishing media No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

chemical

None known.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout

gear. Use personal protection equipment.

## SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

# **SECTION 7: Handling and storage**

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

**Control parameters** 

Exposure Limits This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

Biological occupational exposure

limits

This product, as supplied, does not contain any hazardous materials with biological limits

established by the region specific regulatory bodies.

Appropriate engineering controls

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

**Eve/face protection** Wear safety glasses with side shields (or goggles).

Hand protection Wear suitable gloves.

**Skin and body protection** Wear suitable protective clothing.

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

## SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Solid

**Appearance** powder or cake, lyophilised

ColourwhiteOdourOdourless.

None known

Odour threshold No information available

Property Values Remarks • Method

pH None known Melting point / freezing point 158 °C

Boiling point / boiling rangeNo data availableNone knownFlash pointNo data availableNone known

Evaporation rateNo data availableNone knownFlammability (solid, gas)No data availableNone knownFlammability Limit in AirNone known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available limits

Vapour pressure No data available

Vapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubilitySoluble in waterSolubility(ies)No data availableNone knownPartition coefficientNo data availableNone known

Autoignition temperature

No data available

None known

No data available

None known

None known

No data available

None known

None known

None known

Dynamic viscosity

No data available

None known

Explosive properties

Not applicable.

**Explosive properties**Not applicable. **Oxidising properties**Not applicable.

Other information

Molecular weight Not applicable VOC Content (%) Not applicable

# **SECTION 10: Stability and reactivity**

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions None under normal processing.

Conditions to avoid

Conditions to avoid None known based on information supplied.

Incompatible materials

Incompatible materials None known based on information supplied.

Hazardous decomposition products

Hazardous decomposition products None known based on information supplied.

# **SECTION 11: Toxicological information**

#### **Acute toxicity**

## Information on likely routes of exposure

#### **Product Information**

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

**Ingestion** Specific test data for the substance or mixture is not available.

**Symptoms** No information available.

Acute toxicity

**Numerical measures of toxicity** 

No information available

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation 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 Respiratory irritation Narcotic effects Based on available data, the classification criteria are not met. Based on available data, the classification criteria are not met. 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.

# **SECTION 12: Ecological information**

**Ecotoxicity** 

**Ecotoxicity** The environmental impact of this product has not been fully investigated.

**Aquatic ecotoxicity** 

**Terrestrial ecotoxicty** There is no data for this product.

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** 

No information available.

Mobility in soil

Other adverse effects

No information available.

# SECTION 13: Disposal considerations

#### Waste treatment methods

#### Contaminated packaging

For packages that have been in direct contact with hazardous substances, the person must ensure that the package is rendered incapable of containing any substance. It must be disposed of in a manner that is consistent with the requirements for disposal of the substance that it contained, taking into account the material the package is manufactured from

Packages may only be reused or recycled if the package has been treated to remove any residual contents of the hazardous substance (class 1, 2, 3, 4, or 5); or the contents of the residue in the package are below the threshold for the substance to be classified as hazardous (class 6, 8, or 9 substance)

# **SECTION 14: Transport information**

<u>IATA</u> Not regulated

<u>IMDG</u> Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

## **SECTION 15: Regulatory information**

Safety, health and environmental regulations/legislation specific for the substance or mixture

National regulations

**New Zealand** 

National regulations See Section 8 for any applicable tolerable exposure limits and environmental exposure

limits

Certified handlers, tracking and controlled substance license requirements

Certified handlers are required for some substances. This includes for substances requiring a controlled substance license, including Class 1 explosives, vertebrate toxic agents (9.3A, B, C), and certain fumigants. Class 6.1A and 6.1B substances such as pesticides also require Certified handlers. Please check the Health and Safety at Work Act 2015 for further information

Tracking is required for some highly hazardous substances. These substances need to be under the control of an appropriately trained person or appropriately secured. Please check the Health and Safety at Work Act 2015 for further information.

the Health and Safety at Work Act 2015 for further information

Controlled substance licenses are required to possess certain class 1 (explosive) and class 6 (vertebrate toxic agents or fumigants) substances. See Part 7 of the Health and Safety at Work Regulation 2017 for more information

EPA New Zealand HSNO approval code or group standard

Not applicable

\_\_\_\_\_

#### **International Inventories**

Contact supplier for inventory compliance status

Legend:

**International Regulations** 

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

## **SECTION 16: Other information**

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 19-Aug-2021

**Revision Note** SDS sections updated. 1. 2.

## Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

## Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR) U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA) EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

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**End of Safety Data Sheet** 



# SAFETY DATA SHEET

Revision date 08-Mar-2021 Revision Number 1

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

Product identifier

Product Name LB Broth, Capsules

Catalogue Number(s) 1660412, 1660412EDU, 10011390

Other means of identification

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of the supplier of the safety data sheet

<u>Corporate Headquarters</u>
Bio-Rad Laboratories Inc.

Manufacturer

Bio-Rad Laboratories, Life Science Group

Bio-Rad Laboratories Pty Ltd

1000 Alfred Nobel Drive2000 Alfred Nobel Drive189 Bush RoadHercules, CA 94547Hercules, California 94547Albany AucklandUSAUSANew Zealand

**Technical Service** +64 9 415 2280 or 0508 805 500

sales.nz@bio-rad.com

**Emergency telephone number** 

24 Hour Emergency Phone Number CHEMTREC New Zealand: 64-98010034

## **SECTION 2: Hazards identification**

GHS Classification

Acute toxicity - Oral Category 5 (HSNO - 6.1E)

Label elements

Signal word

Warning

**Hazard statements** 

H303 - May be harmful if swallowed

#### Other hazards which do not result in classification

## SECTION 3: Composition/information on ingredients

Chemical name	CAS No	Weight-%
Non-hazardous ingredients	Proprietary	Balance

## **SECTION 4: First aid measures**

**Description of first aid measures** 

**General advice** No hazards which require special first aid measures.

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

# **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

surrounding environment.

Unsuitable extinguishing media No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

chemical

None known.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout

gear. Use personal protection equipment.

## SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labelled containers.

#### Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

# **SECTION 7: Handling and storage**

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

**Control parameters** 

Exposure Limits This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

**Biological occupational exposure** 

limits

This product, as supplied, does not contain any hazardous materials with biological limits

established by the region specific regulatory bodies.

Appropriate engineering controls

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

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

Hand protection Wear suitable gloves.

**Skin and body protection** Wear suitable protective clothing.

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

## SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical stateSolidAppearancetabletColourlight brownOdoursweet.

None known

None known

Odour threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

pН None known Melting point / freezing point No data available None known Boiling point / boiling range No data available None known Flash point No data available None known No data available None known **Evaporation rate** Flammability (solid, gas) No data available None known None known

Flammability Limit in Air
Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Relative density
Water solubility
Solubility(ies)
No data available
No data available
No data available
No data available

Partition coefficientNo data availableNone knownAutoignition temperatureNo data availableNone knownDecomposition temperatureNo data availableNone knownKinematic viscosityNo data availableNone known

Dynamic viscosityNo data availableExplosive propertiesNot applicable.Oxidising propertiesNot applicable.

Other information

Molecular weight
VOC Content (%)
Not applicable
Not applicable

# **SECTION 10: Stability and reactivity**

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions None under normal processing.

Conditions to avoid

Conditions to avoid None known based on information supplied.

Incompatible materials

Incompatible materials None known based on information supplied.

Hazardous decomposition products

Hazardous decomposition products None known based on information supplied.

# **SECTION 11: Toxicological information**

## **Acute toxicity**

## Information on likely routes of exposure

#### **Product Information**

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

**Ingestion** May be harmful if swallowed.

**Symptoms** No information available.

Acute toxicity

**Numerical measures of toxicity** 

The following values are calculated based on chapter 3.1 of the GHS document

**ATEmix (oral)** 3,000.00 mg/kg **ATEmix (dermal)** 10,010.00 mg/kg

#### Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation 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
Respiratory irritation
Narcotic effects

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

# **SECTION 12: Ecological information**

**Ecotoxicity** 

**Ecotoxicity** 

**Aquatic ecotoxicity** 

**Unknown aquatic toxicity** 0 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

**Terrestrial ecotoxicty** There is no data for this product.

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** No information available.

Mobility in soil

Other adverse effects

No information available.

# SECTION 13: Disposal considerations

Waste treatment methods

#### Contaminated packaging

For packages that have been in direct contact with hazardous substances, the person must ensure that the package is rendered incapable of containing any substance. It must be disposed of in a manner that is consistent with the requirements for disposal of the substance that it contained, taking into account the material the package is manufactured from

Packages may only be reused or recycled if the package has been treated to remove any residual contents of the hazardous substance (class 1, 2, 3, 4, or 5); or the contents of the residue in the package are below the threshold for the substance to be classified as hazardous (class 6, 8, or 9 substance)

# **SECTION 14: Transport information**

<u>IATA</u> Not regulated

IMDG Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

## **SECTION 15: Regulatory information**

Safety, health and environmental regulations/legislation specific for the substance or mixture

**National regulations** 

**New Zealand** 

National regulations See Section 8 for any applicable tolerable exposure limits and environmental exposure

limits

Certified handlers, tracking and controlled substance license requirements

Certified handlers are required for some substances. This includes for substances requiring a controlled substance license, including Class 1 explosives, vertebrate toxic agents (9.3A, B, C), and certain fumigants. Class 6.1A and 6.1B substances such as pesticides also require Certified handlers. Please check the Health and Safety at Work Act 2015 for further information

Tracking is required for some highly hazardous substances. These substances need to be under the control of an appropriately trained person or appropriately secured. Please check the Health and Safety at Work Act 2015 for further information

Controlled substance licenses are required to possess certain class 1 (explosive) and class

6 (vertebrate toxic agents or fumigants) substances. See Part 7 of the Health and Safety at Work Regulation 2017 for more information

EPA New Zealand HSNO approval code or group standard

Not applicable

#### **International Inventories**

Contact supplier for inventory compliance status

Legend:

#### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

## **SECTION 16: Other information**

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 08-Mar-2021

**Revision Note** SDS sections updated. 1. 2.

## Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR) U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)
Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text

**End of Safety Data Sheet** 



# SAFETY DATA SHEET

Revision date 24-Feb-2021 Revision Number 1

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

**Product identifier** 

**Product Name** Lysozyme Lyophilized

9702999 Catalogue Number(s)

Other means of identification

**CAS No** 9001-63-2

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of the supplier of the safety data sheet

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive

Hercules, CA 94547 USA

Manufacturer

2000 Alfred Nobel Drive Hercules, California 94547

USA

**Legal Entity / Contact Address** 

Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd

189 Bush Road Albany Auckland New Zealand

**Technical Service** +64 9 415 2280 or 0508 805 500

sales.nz@bio-rad.com

**Emergency telephone number** 

24 Hour Emergency Phone Number CHEMTREC New Zealand: 64-98010034

# **SECTION 2: Hazards identification**

GHS Classification

Respiratory sensitisation Category 1 (HSNO - 6.5A)

## Label elements



## Signal word Danger

## **Hazard statements**

H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled

ZGHS / BE Page 26 / 33

#### **Precautionary Statements - Prevention**

Avoid breathing dust/fume/gas/mist/vapours/spray In case of inadequate ventilation wear respiratory protection

## **Precautionary Statements - Response**

#### Inhalation

IF INHALED: Remove person to fresh air and keep comfortable for breathing If experiencing respiratory symptoms: Call a POISON CENTER or doctor

## **Precautionary Statements - Disposal**

Dispose of contents/container in accordance with local, regional, national, and international regulations as applicable

Other hazards which do not result in classification

## SECTION 3: Composition/information on ingredients

Chemical name	CAS No	Weight-%
Lysozyme	9001-63-2	50 - 100

## **SECTION 4: First aid measures**

## Description of first aid measures

**General advice** Show this safety data sheet to the doctor in attendance.

**Inhalation** May cause allergic respiratory reaction. If breathing has stopped, give artificial respiration.

Get medical attention immediately. Remove to fresh air. Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation. Get immediate medical advice/attention.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash with soap and water. May cause an allergic skin reaction. In the case of skin irritation

or allergic reactions see a doctor.

**Ingestion** May produce an allergic reaction. Do NOT induce vomiting. Clean mouth with water and

drink afterwards plenty of water. Never give anything by mouth to an unconscious person.

Get immediate medical advice/attention.

Self-protection of the first aider Ensure that medical personnel are aware of the material(s) involved, take precautions to

protect themselves and prevent spread of contamination. Avoid contact with skin, eyes or clothing. Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation. Use personal protective equipment as required. See section 8 for more information.

## Most important symptoms and effects, both acute and delayed

**Symptoms** May cause allergy or asthma symptoms or breathing difficulties if inhaled. Coughing and/ or

wheezing. Itching. Rashes. Hives.

Indication of any immediate medical attention and special treatment needed

Note to doctors May cause sensitisation in susceptible persons. Treat symptomatically.

# **SECTION 5: Firefighting measures**

## Suitable Extinguishing Media

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

ne F

Product is or contains a sensitiser. May cause sensitisation by inhalation and skin contact.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

chemical

Firefighters should wear self-contained breathing apparatus and full firefighting turnout

gear. Use personal protection equipment.

## SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

Personal precautions Avoid contact with skin, eyes or clothing. Ensure adequate ventilation. Use personal

protective equipment as required. Evacuate personnel to safe areas. Keep people away

from and upwind of spill/leak.

**Other information** Refer to protective measures listed in Sections 7 and 8.

**Environmental precautions** 

**Environmental precautions** Prevent further leakage or spillage if safe to do so.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

## SECTION 7: Handling and storage

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Avoid contact with

skin, eyes or clothing. Ensure adequate ventilation. Provide extract ventilation to points where emissions occur. In case of insufficient ventilation, wear suitable respiratory equipment. Do not eat, drink or smoke when using this product. Remove contaminated

clothing and shoes.

General hygiene considerations Avoid contact with skin, eyes or clothing. Wear suitable gloves and eye/face protection. Do

not eat, drink or smoke when using this product. Remove and wash contaminated clothing

and gloves, including the inside, before re-use.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep containers tightly closed in a dry, cool and well-ventilated place. Store locked up.

Keep out of the reach of children. Store according to product and label instructions.

Incompatible materials None known based on information supplied.

## SECTION 8: Exposure controls/personal protection

Control parameters

Exposure Limits This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

**Biological occupational exposure** 

limits

This product, as supplied, does not contain any hazardous materials with biological limits

established by the region specific regulatory bodies.

Appropriate engineering controls

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

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

**Hand protection** Wear suitable gloves.

**Skin and body protection** Wear suitable protective clothing.

exceeded or irritation is experienced, ventilation and evacuation may be required.

None known

**Environmental exposure controls** No information available.

# SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical stateSolidAppearancePowderColourwhiteOdourOdourless.

Odour threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

pН None known Melting point / freezing point No data available None known Boiling point / boiling range No data available None known Flash point No data available None known **Evaporation rate** No data available None known None known No data available Flammability (solid, gas)

Flammability Limit in Air

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

None known

None known

None known

None known

None known

None known

Water solubility Soluble in water Solubility(ies) No data available **Partition coefficient** No data available **Autoignition temperature** No data available

**Decomposition temperature** 

Kinematic viscosity No data available Dynamic viscosity No data available **Explosive properties** Not applicable.

Not applicable.

**Oxidising properties** Other information

Molecular weight Not applicable **VOC Content (%)** Not applicable

# **SECTION 10: Stability and reactivity**

Reactivity

No information available. Reactivity

**Chemical stability** 

Stability Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Possibility of hazardous reactions

Sensitivity to static discharge

Possibility of hazardous reactions None under normal processing.

Conditions to avoid

Conditions to avoid None known based on information supplied.

None.

Incompatible materials

Incompatible materials None known based on information supplied.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

# **SECTION 11: Toxicological information**

## **Acute toxicity**

#### Information on likely routes of exposure

## **Product Information**

Inhalation Specific test data for the substance or mixture is not available. May cause sensitisation in

susceptible persons. (based on components).

**Eve contact** Specific test data for the substance or mixture is not available.

Specific test data for the substance or mixture is not available. Repeated or prolonged skin Skin contact

contact may cause allergic reactions with susceptible persons. (based on components).

Specific test data for the substance or mixture is not available. May cause additional affects Ingestion

as listed under "Inhalation".

Symptoms Symptoms of allergic reaction may include rash, itching, swelling, trouble breathing, tingling

of the hands and feet, dizziness, lightheadedness, chest pain, muscle pain, or flushing.

Coughing and/ or wheezing.

**Acute toxicity** 

**Numerical measures of toxicity** 

No information available

Delayed and immediate effects as well as chronic effects from short and long-term exposure

**Skin corrosion/irritation**Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

Respiratory or skin sensitisation May cause sensitisation by inhalation

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 Respiratory irritation Narcotic effects Based on available data, the classification criteria are not met. Based on available data, the classification criteria are not met. 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.

# **SECTION 12: Ecological information**

**Ecotoxicity** 

**Ecotoxicity**The environmental impact of this product has not been fully investigated.

**Aquatic ecotoxicity** 

**Terrestrial ecotoxicty**There is no data for this product.

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** No information available.

Mobility in soil

Other adverse effects

No information available.

## **SECTION 13: Disposal considerations**

#### Waste treatment methods

### Contaminated packaging

For packages that have been in direct contact with hazardous substances, the person must ensure that the package is rendered incapable of containing any substance. It must be disposed of in a manner that is consistent with the requirements for disposal of the substance that it contained, taking into account the material the package is manufactured from

Packages may only be reused or recycled if the package has been treated to remove any residual contents of the hazardous substance (class 1, 2, 3, 4, or 5); or the contents of the residue in the package are below the threshold for the substance to be classified as hazardous (class 6, 8, or 9 substance)

# **SECTION 14: Transport information**

Not regulated IATA

IMDG Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

## SECTION 15: Regulatory information

Safety, health and environmental regulations/legislation specific for the substance or mixture

**New Zealand** 

See Section 8 for any applicable tolerable exposure limits and environmental exposure **National regulations** 

Certified handlers, tracking and controlled substance license requirements

Certified handlers are required for some substances. This includes for substances requiring a controlled substance license, including Class 1 explosives, vertebrate toxic agents (9.3A, B, C), and certain fumigants. Class 6.1A and 6.1B substances such as pesticides also require Certified handlers. Please check the Health and Safety at Work Act 2015 for further information

Tracking is required for some highly hazardous substances. These substances need to be under the control of an appropriately trained person or appropriately secured. Please check

the Health and Safety at Work Act 2015 for further information

Controlled substance licenses are required to possess certain class 1 (explosive) and class 6 (vertebrate toxic agents or fumigants) substances. See Part 7 of the Health and Safety at

Work Regulation 2017 for more information

**EPA New Zealand HSNO approval** 

Not applicable

code or group standard

**International Inventories** 

Contact supplier for inventory compliance status

Legend:

International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

## **SECTION 16: Other information**

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 24-Feb-2021

**Revision Note** Significant changes throughout SDS. Review all sections.

## Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

## Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR) U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA) EPA (Environmental Protection Agency) Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### Disclaimer

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**End of Safety Data Sheet**